 Fermilab	Quality Section Procedures	
Procedure Number/Name Fermilab Quality Tool Suite User Guide		Original Date:
Written by: Mary Curtis	Reviewed and Updated By: Jemila Adetunji	Date: 23 March 2021

Revision History

Author	Description of Change	Revision Date
Mary Curtis	Update the User Guide to reflect the recent changes made to the database.	23 March 2021
Mary Curtis	Update iTrack guide to reflect changes to iTrack database and introduce the Fermilab Quality Tool Suite.	22 May 2020



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1.0 PURPOSE


The purpose of this guide is to provide detailed instructions on the use of Fermilab Quality Tool Suite.

2.0 MATERIALS/PRE-REQUISITES NEEDED

1. A valid Fermilab 5-digit ID – This includes employees, visitors, and contractors.
2. Data entry rights – obtain from the [Quality Section](#).
3. Fermilab Services User name and Password.

3.0 REFERENCES

Quality Assurance Manual (QAM) Chapter 12030 – [Fermilab Quality Tool Suite Procedures & Risk Assignment](#)

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4.0 DEFINITIONS

See Technical Appendix for terms and definitions.

5.0 RESPONSIBILITIES

5.1 Quality Section Head

- Take ownership of and manage the Fermilab Quality Tool Suite; and provide training for its use.

5.2 Data Entry User (iTrack and Lessons Learned Databases)

- Accurately enter information into Fermilab Quality Tool Suite databases (iTrack and Lessons Learned).

5.3 Responsible Parties (iTrack and Lessons Learned)

- Address assigned items in iTrack or Lessons Learned database appropriately. Provide detailed information of actions taken or decisions made, and evidence where applicable.
- Complete effectiveness reviews for all times when required.

6.0 DETAILED PROCEDURE

Fermilab Quality Tool Suite (FQTS) is a collection of three databases managed by the Quality Section: iTrack for issues management; Lessons Learned for collecting lessons learned information from external and internal sources; and the Fermilab Assessment Schedule for tracking internal assessments. This *Fermilab Quality Tool Suite User Guide* provides instructions for using and searching the iTrack and Lessons Learned databases. The Assessment Schedule database is available as a resource; data entry or changes to it are limited to Quality Section members.

6.1 Accessing Fermilab Quality Tool Suite

Access Fermilab Quality Tool Suite through [Quality Section homepage](#) (Figure 1).


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Figure 1 Quality Section Homepage – Access Fermilab Quality Tool Suite



The screenshot shows the Fermilab Quality Section homepage. The page has a blue header with the Fermilab logo and navigation links. The main content area is titled "Quality Section" and features a central diagram of the Quality Management System. The page is divided into several sections: ESH public site, ESH at work, ESH Resources, Tools, Bulletins, Related Links, Training courses, QA Program Documents, Forms, Databases, and Meeting Minutes. Red arrows point from a text box on the right to specific links: "In any emergency dial 3131", "Tools" (specifically iTrack), "QA Program Documents" (specifically QA Manual), and "Databases" (specifically iTrack).

ESH public site

- Manuals
- Environmental Reports
- Worker Safety and Health for Subcontractors
- ES&H Organizational Chart

ESH at work

- Emergency Management
- Environmental Protection
- Human Performance Improvement (HPI)
- Industrial Hygiene
- Medical Office
- Radiological Protection
- Safe At All Times
- Safety – Construction
- Safety – Occupational
- Training
- Work Planning & Control

ESH Resources

- Contractor Assurance System-CAS
- Contact
- FAQs
- FESHCom, Fermilab ES&H Committee
- Forms
- Report an Environment, Safety or Security Concern
- Safety Data Sheet (SDS) Search
- Section Admin

In any emergency dial 3131

Tools

- docDB
- FermiDash
- iTrack
- Oracle data entry
- Oracle Privileges

Bulletins

- Hazard Analysis
- Ergonomics: Working from Home
- Snowmobile Service Schedule
- Reminder About Work Planning Safety
- Anonymous email to Amber Kenney, CISO

Related Links

- Sustainability
- Weather at Fermilab

Quality Section

Quality Assurance (QA) at Fermilab is integrated into one laboratory-wide Quality Assurance Management System. It is a set of interrelated elements that Fermilab uses to plan, direct, control, assure and improve how quality policies and procedures are established, implemented, and monitored.

QA Contacts

Jemila Adetunji – Manager

Dave Baird

Mary Curtis

Tom DiGrazia

Matt Luedke

TJ Sarina

Click here for Fermilab QA Program Support Points of Contacts.

Quality Assurance Section is located in Wilson Hall 7 East.

FOR EMPLOYEES

FOR QUALITY ASSURANCE GROUP

Training courses

- QA Program at Fermilab
- Fermilab Quality Tool Suite (FQTS)
- Fermilab Software QA Program
- Internal Assessor
- Suspect/Counterfeit Item Identification
- HPI 1-day Manager Course
- HPI 1/2-day Employee Course

Suspect/Counterfeit Items

- Suspect/Counterfeit Item Coordinator List
- QAM 12030: Suspect/Counterfeit Item
- Suspect/Counterfeit Item Tag, stockroom #2650-402500

Software Quality Assurance

- Software Quality Assurance Webpage
- SQA Inventory Template
- QAM 12030: Software QA Program
- QAM 12090: Software QA Grading & Inventory

Assessments

- Fermilab Assessment Plan
- ESH&Q Assessments
- Tripartite Assessment Schedule
- QAM 12080: Fermilab Assessment Program
- ISO/IEC 9001:2015

Issues Management

- iTrack
- Quality Assurance Manual
- Tools
 - Quality Reference Guide
 - 5-Why Tool
 - Fishbone Diagram Tool
 - Example
 - Process Flow Data Collection – Template

QA Program Documents

- Fermilab Quality Assurance Policy
- QA Manual
- QAM 12002: Fermilab Quality Assurance Program
- QAM 12080: Quality Assurance Guidelines for Scientific Research
- QAM 12100: Incoming Inspection and Acceptance
- FESHM 1051: Control of ESH Documents
- FESHM 2070: Training Program
- FESHM 2090: CMFU of Software Related to ESH
- FESHM 3000 Series: Investigation and Reporting

Forms

- Assessment Planning Template
- Assessment Communication Memo Template
- Self-Assessment Report Template

Databases

- Lessons Learned
- QAM 12010: Fermilab Lessons Learned Program
- iTrack
 - QAM 12030: FQTS Procedures and Risk Assignment
 - QAM 12040: Corrective and Preventive Actions
 - QAM 12050: Root Cause Analysis
- HPI Timeline, Database, and Form
- QAM 12110: Human Performance Improvement (HPI)

Meeting Minutes

- Quality Assurance Subcommittee – (Disseminated March 2019)

Quick Links

- Quality Assurance (QA) Manual
- Fermilab Quality Tool Suite (FQTS)
- Performance Evaluation and Measurement Plan (PEMP)
- Contractor Assurance System (CAS)
 - QA Management System
- FermiDash QA Tools
- Fermilab Access and KPIs
- Contractor Assurance System (CAS)
- HPI Webpage
- Fermilab Records Management

If you have questions about the content on this page, please contact Jemila Adetunji.

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Interact

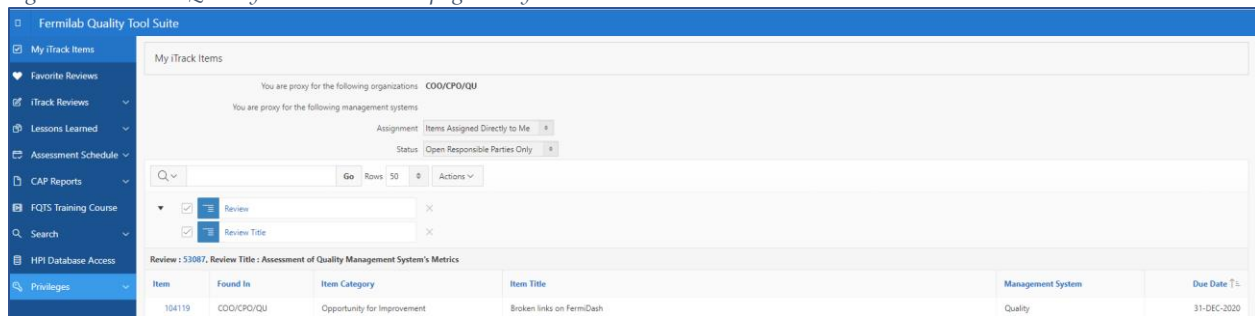
- Facebook
- Twitter
- Instagram
- YouTube
- Pickr
- LinkedIn

Use the QS homepage to access Fermilab Quality Tool Suite. Click on any of the 3 references to iTrack.

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FQTS will open to the “My iTrack Items” page, with a table listing all open iTrack items assigned to you or assigned to you as a proxy. (Figure 2) Change the display to show all items assigned to you (open and closed) by changing the “Status” drop-down field at the top of the page.

Figure 2 Fermilab Quality Tool Suite Homepage – My iTrack Items



Use the Navigation bar on the left to access and search the different databases. The Navigation bar remains the same on every page of the FQTS.

- *My iTrack Items* – A list of those items you are responsible for.
- *Favorite Reviews* – A place to maintain your bookmarked Reviews.
- *iTrack Reviews* – Access to iTrack database.
- *Lessons Learned* – Access to Lessons Learned database.
- *Assessment Schedule* – Access to the Fermilab Assessment Schedule, the Tripartite Schedule, and links to templates and resources.
- *CAP Reports* – access to effectiveness reviews and verification reviews.
- *FQTS Training Course* – link to the FQTS Training course.
- *Search* – Several ways to search iTrack.
- *HPI Database Access* – Access to HPI results and information.

6.2 Data Entry Process – iTrack

6.2.1 Create a Review in iTrack

To create a Review in iTrack, open the iTrack Reviews database (from the Navigation bar) and click on **Create a Review** at the upper right (Figure 3).


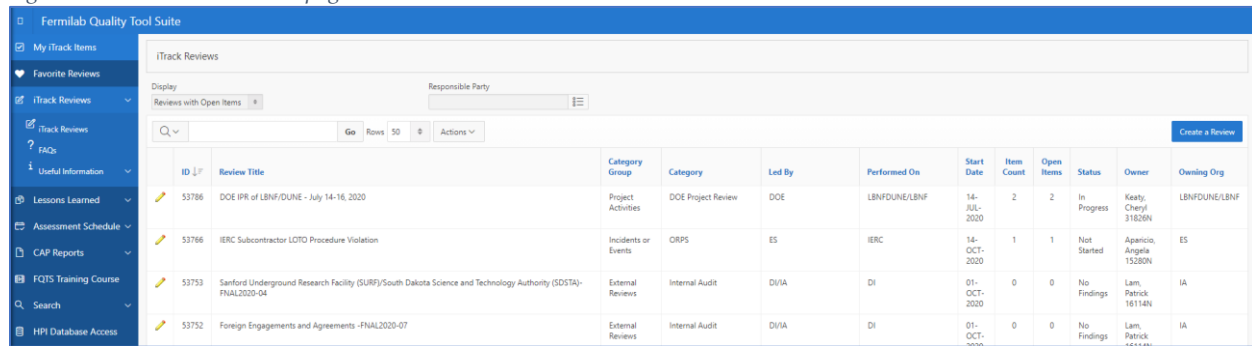
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Figure 3 iTrack Reviews Homepage



ID	Review Title	Category Group	Category	Led By	Performed On	Start Date	Item Count	Open Items	Status	Owner	Owning Org
53786	DOE IPR of LBNF/DUNE - July 14-16, 2020	Project Activities	DOE Project Review	DOE	LBNFDUNE/LBNF	14-JUL-2020	2	2	In Progress	Kearl, Cheryl 318269N	LBNFDUNE/LBNF
53786	IERC Subcontractor LOTO Procedure Violation	Incidents or Events	ORPS	ES	IERC	14-OCT-2020	1	1	Not Started	Aparicio, Angela 15280N	ES
53753	Sanford Underground Research Facility (SURF)/South Dakota Science and Technology Authority (SDSTA)-FNAL2020-04	External Reviews	Internal Audit	DI/IA	DI	01-OCT-2020	0	0	No Findings	Lam, Patrick 16114N	IA
53752	Foreign Engagements and Agreements -FNAL2020-07	External Reviews	Internal Audit	DI/IA	DI	01-OCT-2020	0	0	No Findings	Lam, Patrick 16114N	IA

Figure 4 will open; follow the steps to complete the Review page.


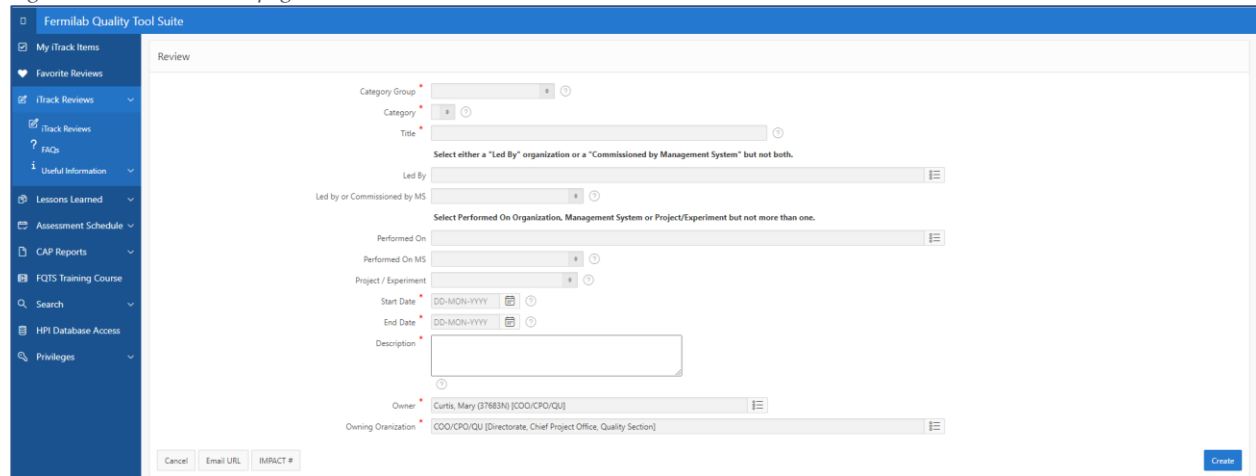
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Figure 4 Create a Review page



Enter all required information (marked with an *).

Two exceptions: Only one “Led by” entry is required. Only one “Performed On” entry is required.

Steps to Create a Review (Figure 4)

1. **Category Group*** – Select the high-level category group from the drop-down list. (Your choice will populate “**Category***” entry with sub-category options.)
2. **Category*** – Select the appropriate sub-category from list.
3. **Title*** – Enter a descriptive title of the Review.
*Only one of the next two entries is required. **
4. **Led By** – Select the Organization from the drop-down list that led the Review.
5. **Led By or Commissioned by MS** – Select the MS that led or requested the Review.
*Only one of the next three entries is required. **
6. **Performed on** – Select the Organization reviewed from the drop-down list.
7. **Performed on MS** – Select the Management System reviewed from the list.
8. **Project/Experiment** – Select the one reviewed from the drop-down list.
9. **Start Date*** – Enter the date the Review started.
10. **End Date*** – Enter the date the Review ended.
11. **Description*** – Enter a description of the Review.
12. **Owner*** – This will auto populate with the Review creator’s name but may be changed to any Fermilab employee.
13. **Owning Organization*** – This will auto populate with the original Owner’s organization but may be changed to any Fermilab organization.
14. Click **Create**.

After clicking “Create,” Figure 5 will display, with the green **✓ Action Processed** box confirming the Review was created. From this page, you may edit the information or enter more details.


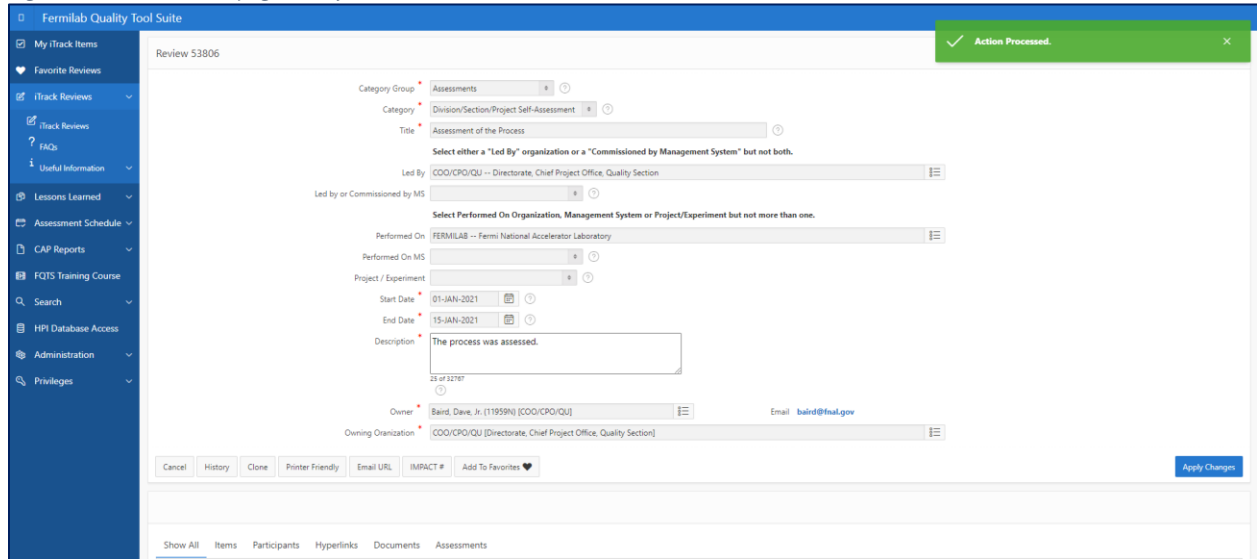
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Figure 5 iTrack Review page – confirmation



Click **Apply Changes** to save changes to the record.

To add information to the Review, use the row of buttons or row of tabs at the lower left.

Row of Buttons

Cancel	Return to the main Review page.
History	A log of the changes to the current page.
Clone	Create a new Record by copying some of the current record.
Printer Friendly	Provides a printer-friendly copy of the current record.
Email URL	Provides a way to directly email the record.
IMPACT #	Links to the Integrated Management Planning and Control Tool.
Add to Favorites 	Provides a way to directly bookmark the Review record.

Row of Tabs

Show All	Displays access to the other four tabs.
Items	Provides the way to create an item for this Review.
Participants	Provides the way to add a participant for this Review.
Hyperlinks	Provides the way to add a hyperlink for this Review.
Documents	Provides the way to upload supporting documents for this Review.
Assessments	Provides a way to link this Review to an existing Assessment.

Steps to add **Participants** (Figures 6a and 6b)

A Participant is *member of the Review team*.

From Figure 5, click on **Participants** tab and then **Create Participant**; Figure 6a will open.

1. **Participant*** – Search and select the Participant's names from the dialog box.
2. **Organization*** – Select the Participant's organization.
3. Click **Create**. (Figure 6b shows confirmation.)

Repeat steps to add more Participants.

Figure 6a Create Participant

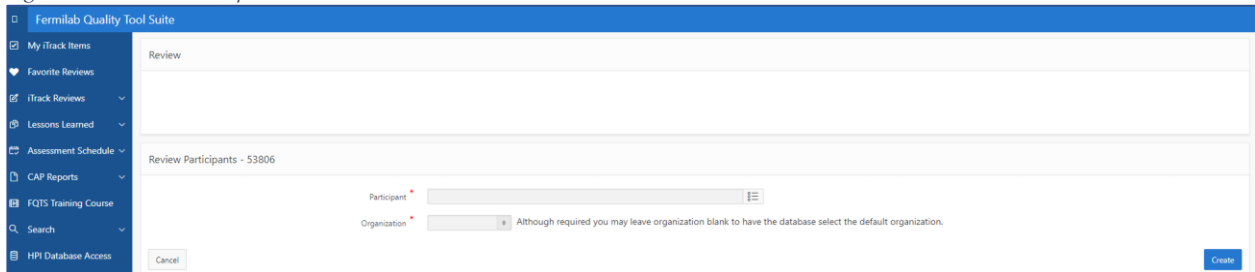
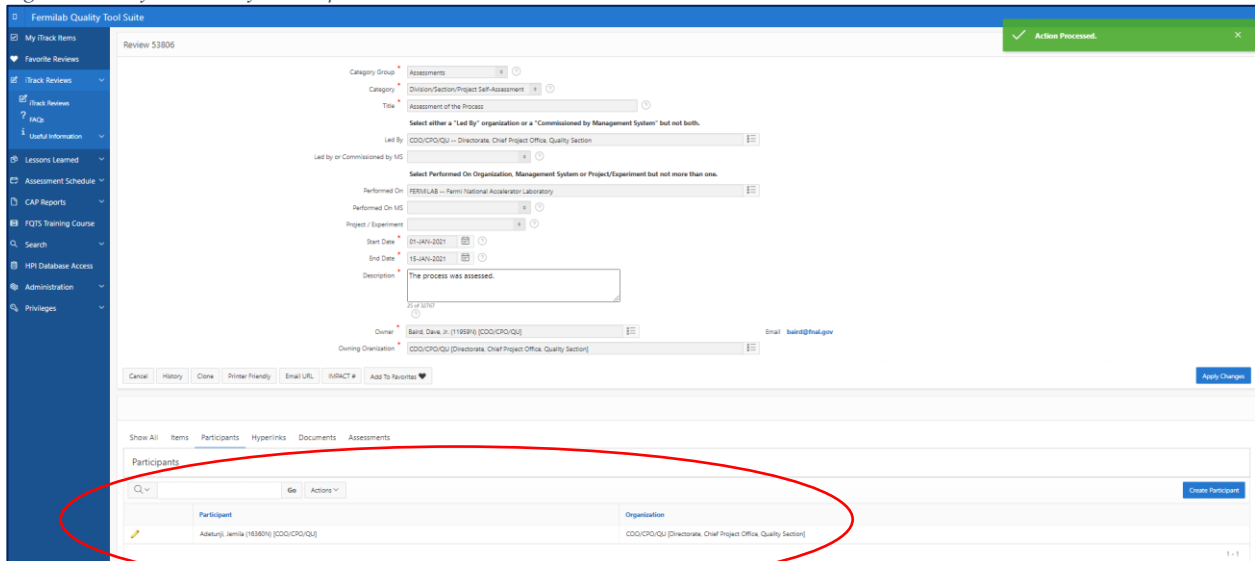


Figure 6b Confirmation of Participant Creation



Steps to Create a **Hyperlink** (Figures 7a and 7b)

Click on the **Hyperlinks** tab and then **Create Hyperlink**. Figure 7a will open.

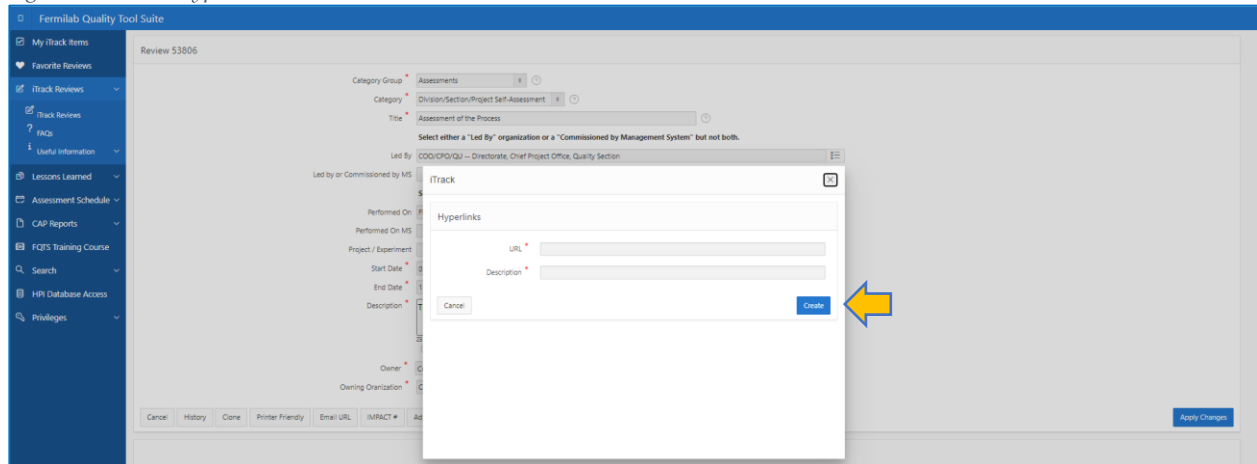
1. **URL*** – Enter link address, including <http://> or <https://>.

2. **Description*** – Enter a description of the URL's record.

3. Click **Create**.

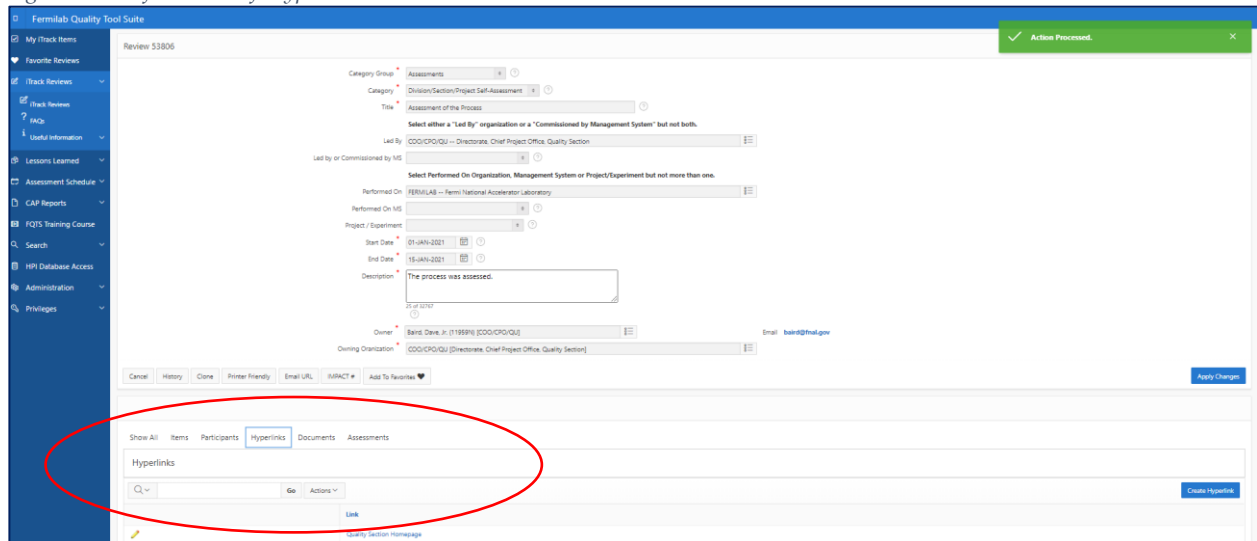
Repeat steps for each Hyperlink.

Figure 7a Create Hyperlinks




The screenshot shows the 'Fermilab Quality Tool Suite' interface. A 'Review 53806' form is visible in the background. Overlaid on this is a 'Hyperlinks' dialog box with the following fields: 'URL' (with a red asterisk), 'Description' (with a red asterisk), and a 'Create' button. A yellow arrow points to the 'Create' button. The dialog also has a 'Cancel' button.

Figure 7b Confirmation of Hyperlink Addition



The screenshot shows the 'Fermilab Quality Tool Suite' interface. The 'Review 53806' form is visible. At the bottom, there is a 'Hyperlinks' tab. A red circle highlights the 'Hyperlinks' tab and the 'Create Hyperlink' button. The 'Hyperlinks' tab shows a list of hyperlinks with columns for 'Show All', 'Items', 'Participants', 'Hyperlinks', 'Documents', and 'Assessments'. The 'Hyperlinks' column has a search bar and a 'Go' button. The 'Create Hyperlink' button is located at the bottom right of the 'Hyperlinks' tab.

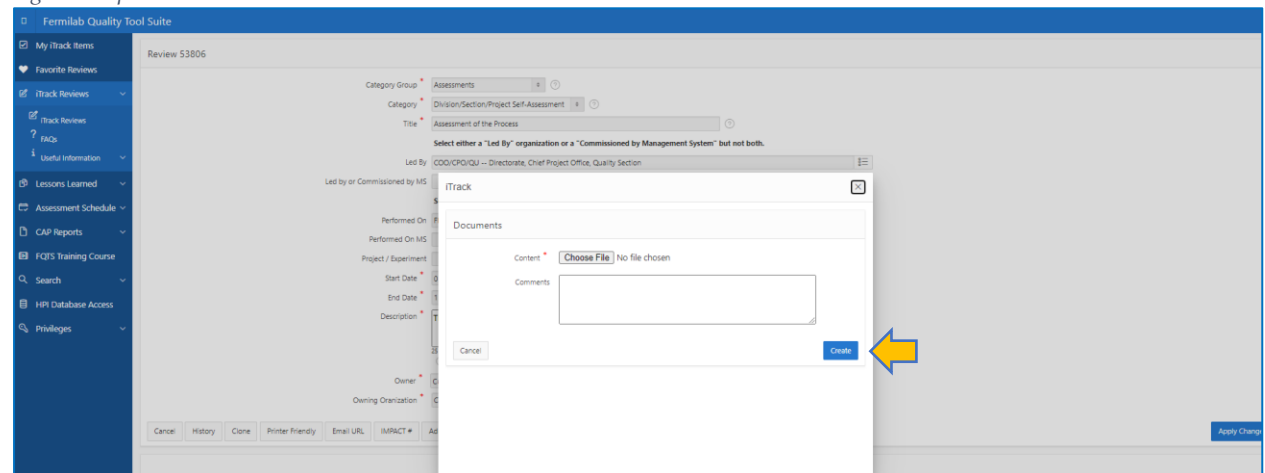
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Steps to Add a Document (Figure 8)

Click on the **Documents** tab and then **Upload Document**. Figure 8 will open.

1. **Content*** – Click on the field and you will be directed to files on your computer. Locate the file and click enter.
 2. **Comments*** – Enter a description of the document uploaded.
 3. Click **Create**.
- Repeat steps for each Document.

Figure 8 Upload a Document to a Review



Confirmation of the Document upload will be the same as the hyperlink upload and participant addition confirmations (Figures 6b and 7b).

Steps to Link an Assessment (Figure 9)

Click on the **Assessments** tab and then **Link Assessment**. Figure 9 will open.

1. **Assessment Plan*** – Click on the field and search for the Assessment record to link to this Review.
 2. Click **Create**.
- Repeat steps for each Assessment.


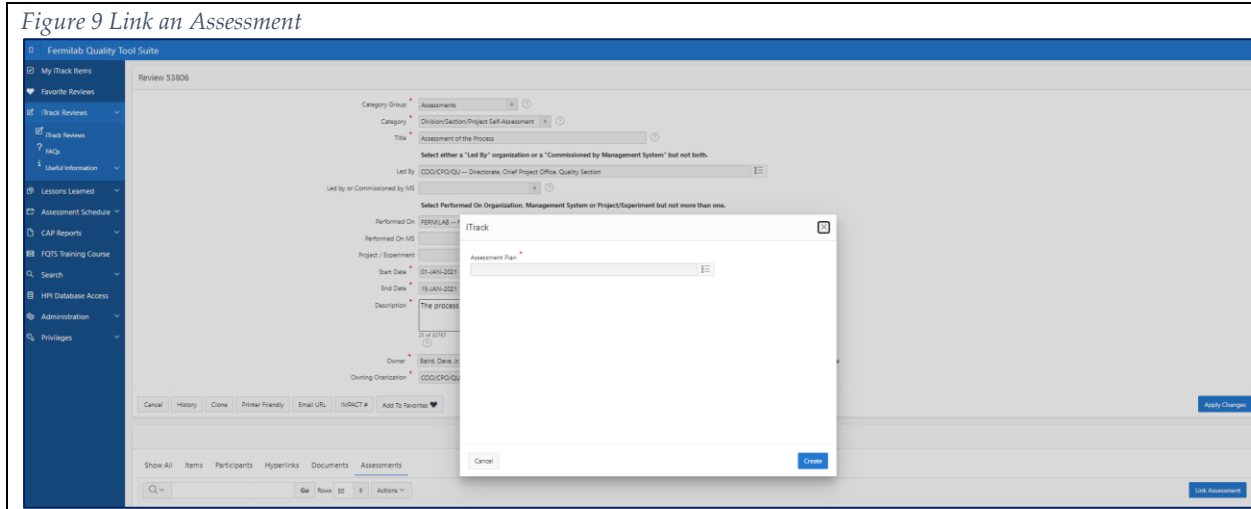
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Figure 9 Link an Assessment



6.2.2 Add an Item to a Review

An Item is the result of a Review. Item types are: *Best Practice, Lessons Learned, Management Concern, Nonconformance, Opportunity for Improvement, and Recommendation*. Figure 10a describes the steps to create a *Nonconformance*; the steps to create a *Management Concern, OFI, or Recommendation* are the same.

See Figures 18a&b and 19a&b for details on how to create *Best Practice and Lessons Learned*.

Steps to Create an Item (Figure 10a&b)

Click on the **Items** tab and then **Create Item** button. Figure 10a will open.

Note the breadcrumb at the top of the page provides information about the Review.

1. **Item Title*** – Descriptive title of the Item or the number assigned to the Item from a DOE assessment.
2. **Item Type*** – Select from the dialog box. Item types are:
 - a. **Best Practice** – A positive example of a work process or innovative approach with the potential to be the basis for significant operational improvements or cost savings.
 - b. **Lessons Learned** – A best practice that is captured and shared to promote repeat application, or an adverse work practice or experience that is captured and shared to prevent recurrence.

- c. **Management Concern** – An issue management has identified that requires action to mitigate associated risk. Requires performance of a risk analysis, identification of a root cause, and identification of corrective or preventive actions.
- d. **Nonconformance** – The nonfulfillment of a specified requirement. A nonconformance can be found in a service, product, process, from a supplier, policy, or system. The specified requirements can be identified from a regulatory body or internal policy or procedure. Requires performance of a risk analysis, identification of a root cause, and identification of corrective or preventive actions.
- e. **Opportunity for Improvement** – Suggestions on how to improve the topic.
- f. **Recommendation** – A suggestion or proposal from the Reviewer as to the best course of action to take on the identified topic.

Depending on the Item Type selected, the following fields may or may not be required.

- 3. **Item Category*** – Select the appropriate category. This is not the cause of the issue but the category of the issue.
- 4. **Found In Organization*** – Select the Organization where the Item was found.
- 5. **Responsible Party*** – Select the person responsible for responding to this item.
- 6. **Management System*** – From the dialog box, select the Management System associated with this item.
- 7. **Date Found*** – Enter the date the item was found.
- 8. **Due Date*** – Enter the target date to complete the actions and/or responses to address the item. (Not required for Best Practice.)
- 9. **Begin Email Reminders** – Optional field. Select how far in advance a reminder will be sent to the Responsible Party.
- 10. **Project or WBS#** – Optional field. Enter WBS# or Project related #.
- 11. **Hazard Severity*** – Select severity level associated with this item. Required for nonconformance and management concern; optional for OFI and recommendation (select n/a). Use the [Hazard Severity Table](#) provided at the top of the page.
- 12. **Mishap Probability*** – Select how often this item is likely to occur. Required for nonconformance and management concern; optional for OFI and recommendation (select “does not apply”).
- 13. **Description*** – Describe the Item so the Responsible Party understands it.
- 14. Click [Create](#)

Repeat steps to add a Nonconformance, Management Concerns, OFI, or Recommendation. See Figures 17 and 18 for steps to create Best Practice and Lessons Learned.


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Figure 10a Create Item – Item Page

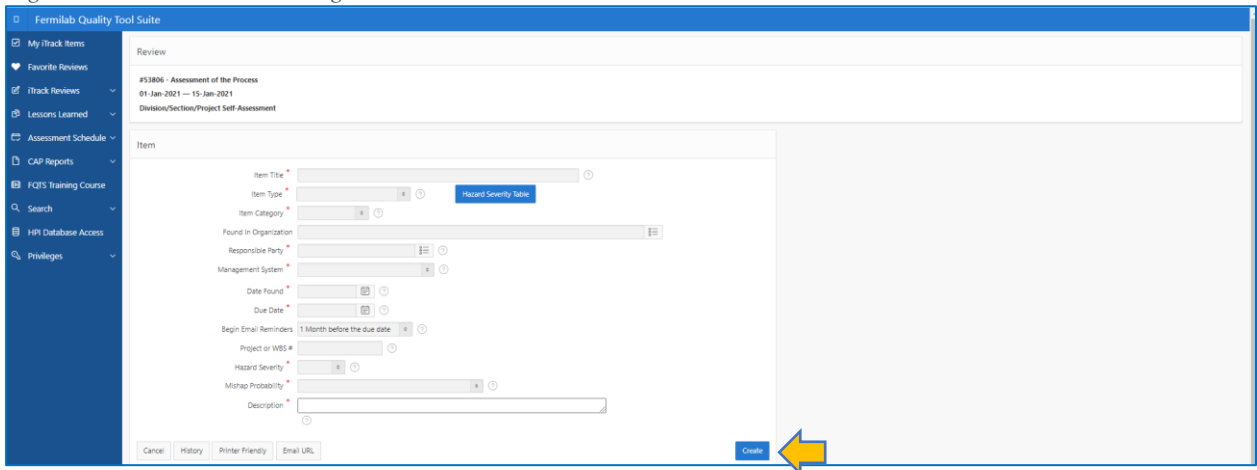


Figure 10b Confirmation of Item Creation – Item Page

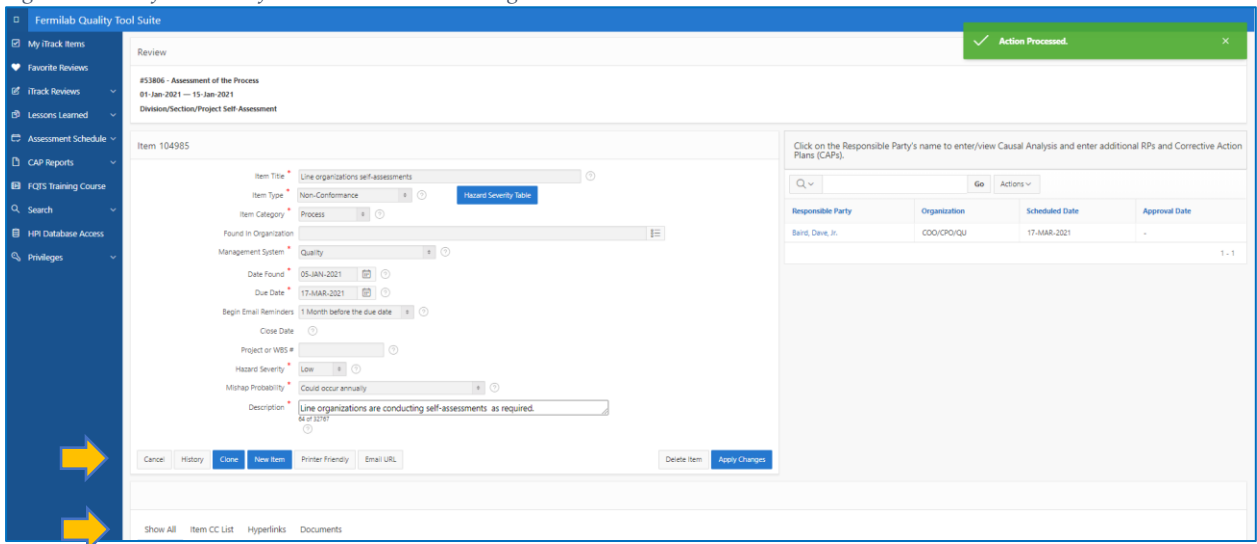



Figure 10b, the **Item page**, will open with the green **Action Processed** confirmation. On the lower left of this page are a row of buttons and a row of tabs. From the blue buttons you can **Clone** the Item (Section 7.4) or add a **New Item**, (click on the button and a blank Item page will open) or edit. (Click on **Apply Changes** to save edits.) The gray buttons allow you to return to the Review page (cancel button), view the history of the item, view a printer-friendly report, and directly email the Item to a recipient.

The row of tabs allows you to add recipients to a CC List, add hyperlinks, and upload documents relevant to this **Item**. The process for adding hyperlinks and documents to an **Item** is the same as described in Section 6.2.1 (Figures 7 and 8).

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The process to add a recipients CC List is in Figures 11a and b.

Steps to Create CC (Figures 11a&b)

On the Item page, click **Item CC list** tab then **Create CC** to add names of individuals who should receive information on this Item. Figure 11a will open.

1. **CCed* Worker** – From the dialog box, select the name(s) of those who should be cc'd.
2. Click **Create**

Confirmation of a CC creation will appear (Figure 11b). Repeat steps for each CC request.

Figure 11a Create CC

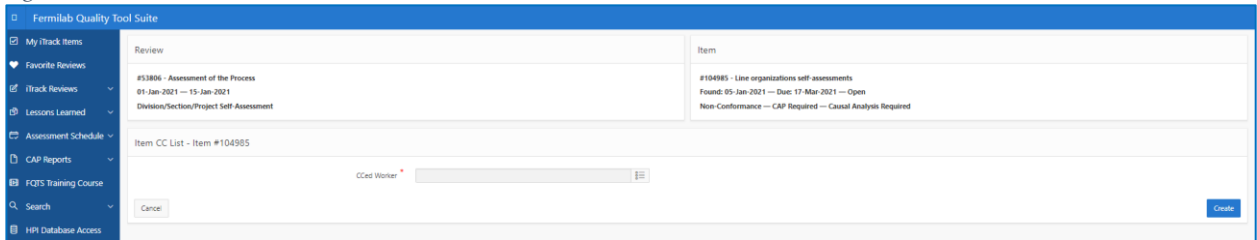
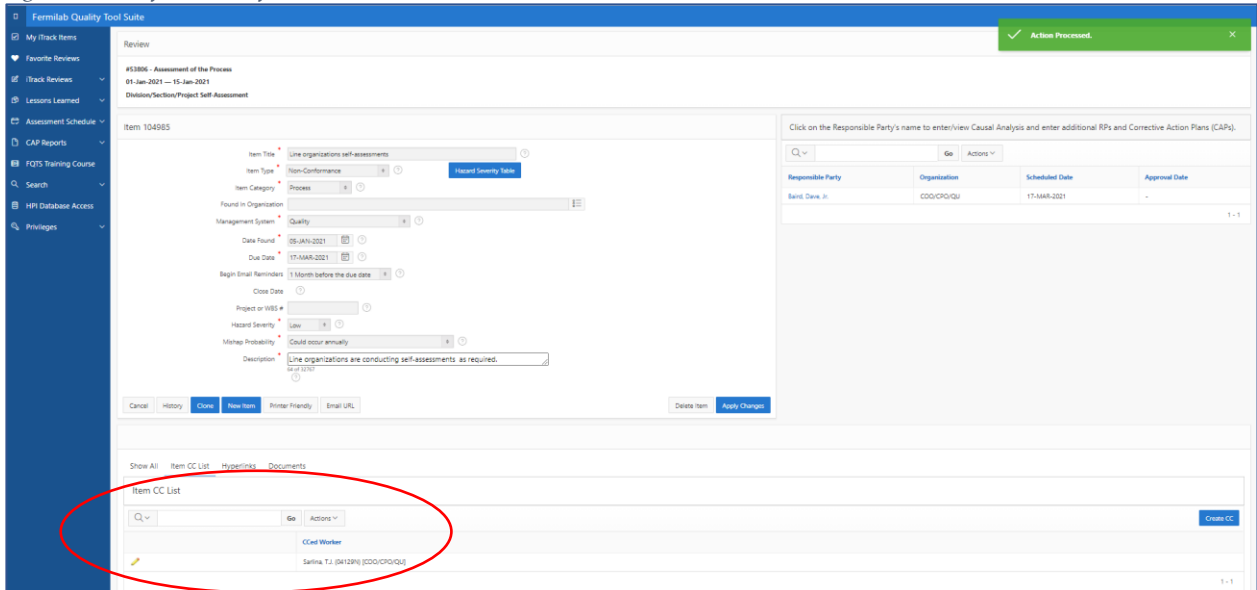



Figure 11b Confirmation of CC creation

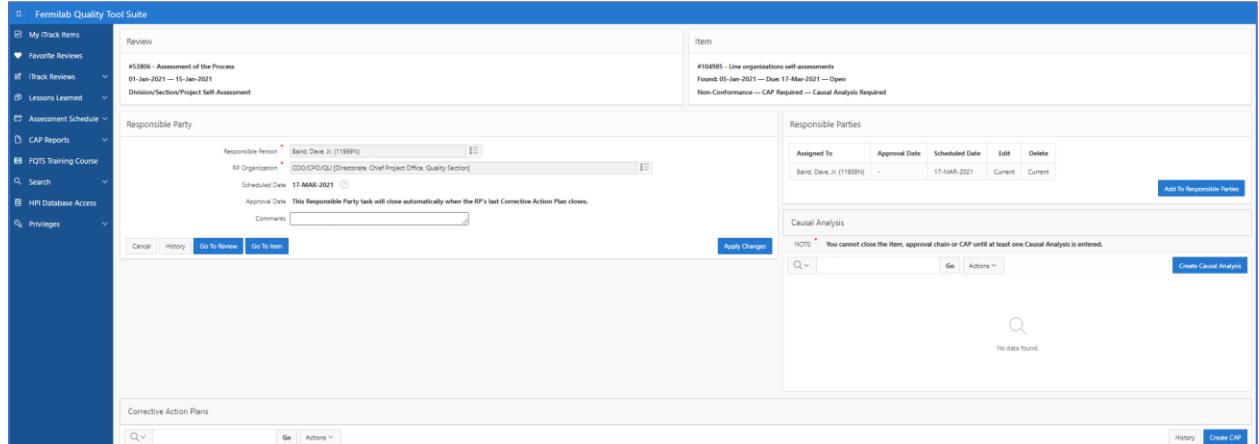


Add Responsible Parties

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To add Responsible Parties, a Causal Analysis, and a Corrective Action Plan to this **Item**, click on the [Responsible Party's name](#) at the upper right on the **Item page**. The **Responsible Party Page** (Figure 12) will open.

Figure 12 Responsible Party Page



At the right side of the **Responsible Party Page** (Figure 12), find [Add to Responsible Parties](#). Click on it and Figure 13a will open.

Steps to Add Responsible Parties (Figure 13a&b)

1. **Responsible Party*** – Select the name of the Responsible Parties from the dialog box.
 2. **Scheduled Date*** – Keep the original date or change it.
 3. **Comments** – Optional. Provide details on approval chain for this Item.
 4. Click [Create](#).
- Repeat steps to add more Responsible Parties for the Item.


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Figure 13a Add to Responsible Parties page

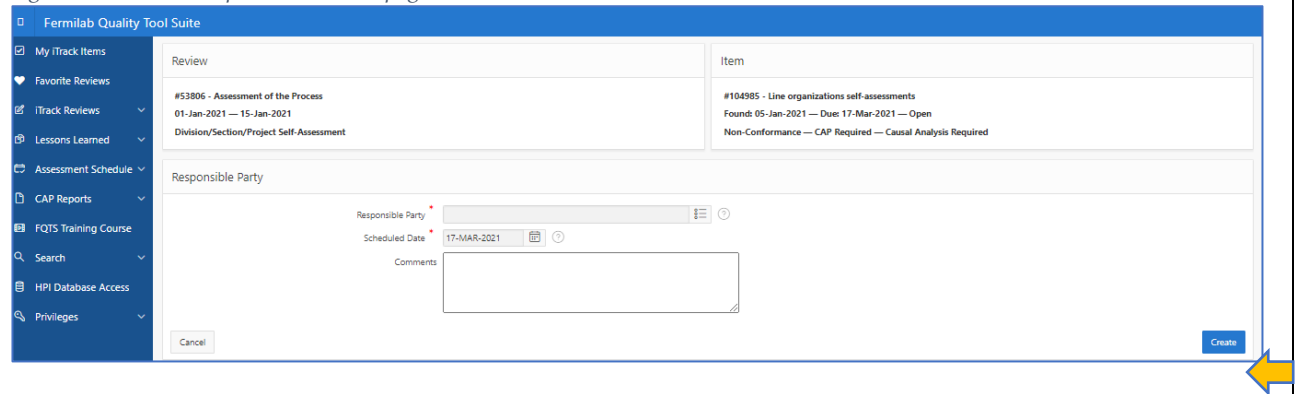
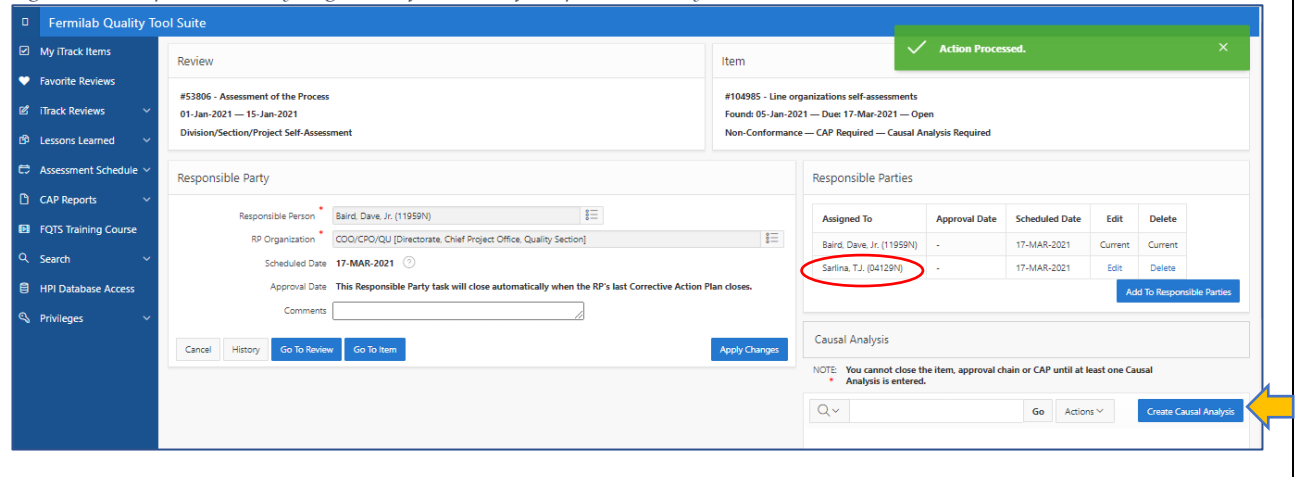


Figure 13b Responsible Party Page – Confirmation of Responsible Party addition



Add Causal Analysis

A casual analysis is required for a nonconformance and management concern. It is optional for an OFI and recommendation.

To add a causal analysis, from the **Responsible Party Page** (Figure 13b) click on **Create Causal Analysis**. Figure 14a will open.

Steps to Add Casual Analysis (Figures 14a&b)

1. **Analysis Code*** – Select the appropriate Level A causal node from the drop-down list.
2. ***** – Select the appropriate Level B causal node from the drop-down list.
3. ***** – Select the appropriate Level C causal node from the drop-down list.
4. **Causal Narrative*** – Describe the causal analysis.
5. Click **Create**.

Confirmation of a Causal Analysis addition will appear (Figure 14b). Repeat steps to add Causal Analyses to the Item.

Figure 14a Create Causal Analysis Page

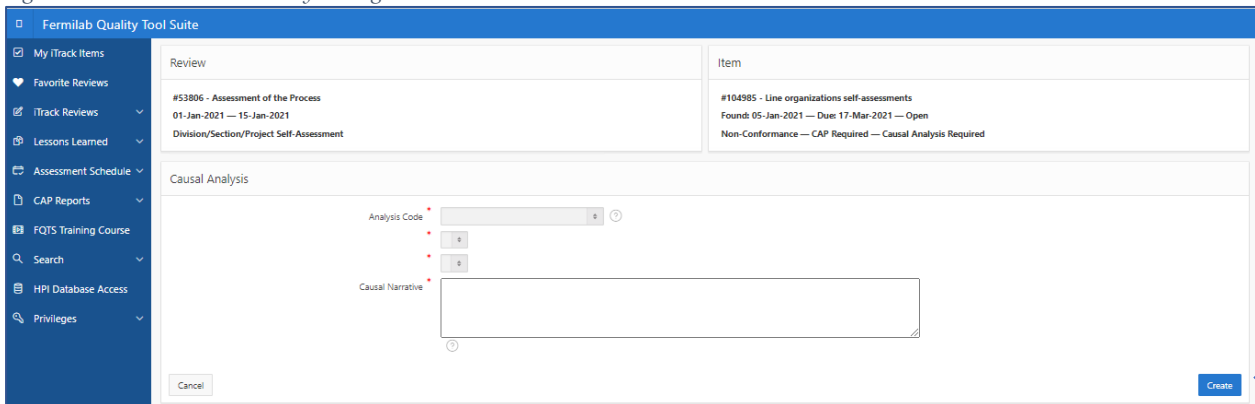
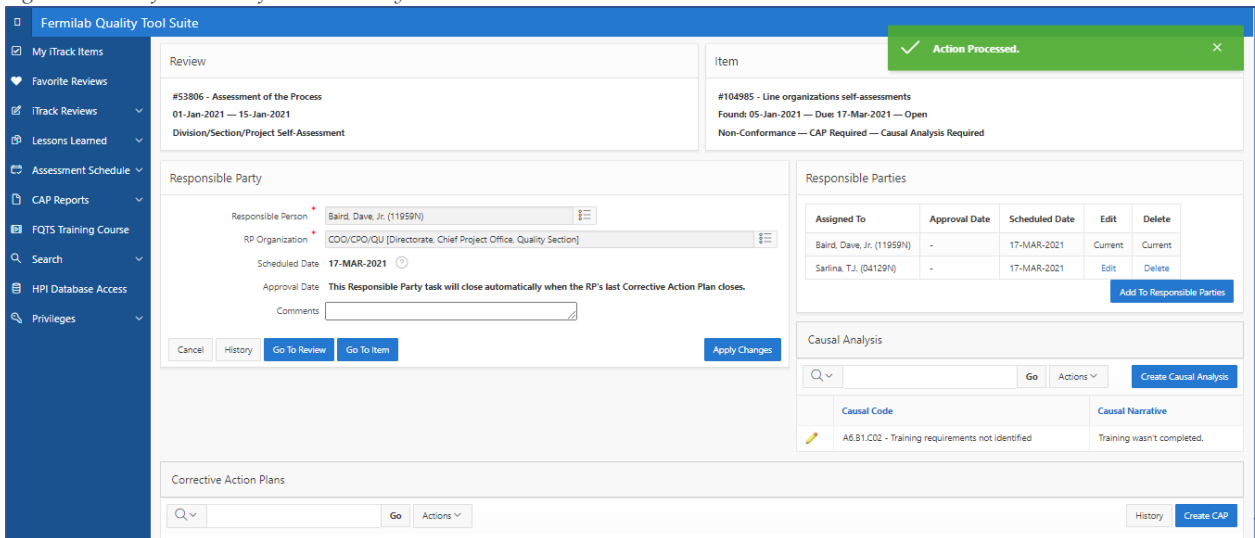



Figure 14b Confirmation of Causal Analysis Addition



Add a **Corrective Action Plan** (See the following section, 6.2.3, for adding a CAP to an Item.)

	<h2 style="text-align: center;">Quality Section Procedures</h2>	
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6.2.3 Action Plans/Responses

To add Corrective Action Plans (Action Plans/Responses) to an Item, from the **Responsible Party Page** click on **Create CAP.** (see arrow on Figure 14b) Figure 15a will open.

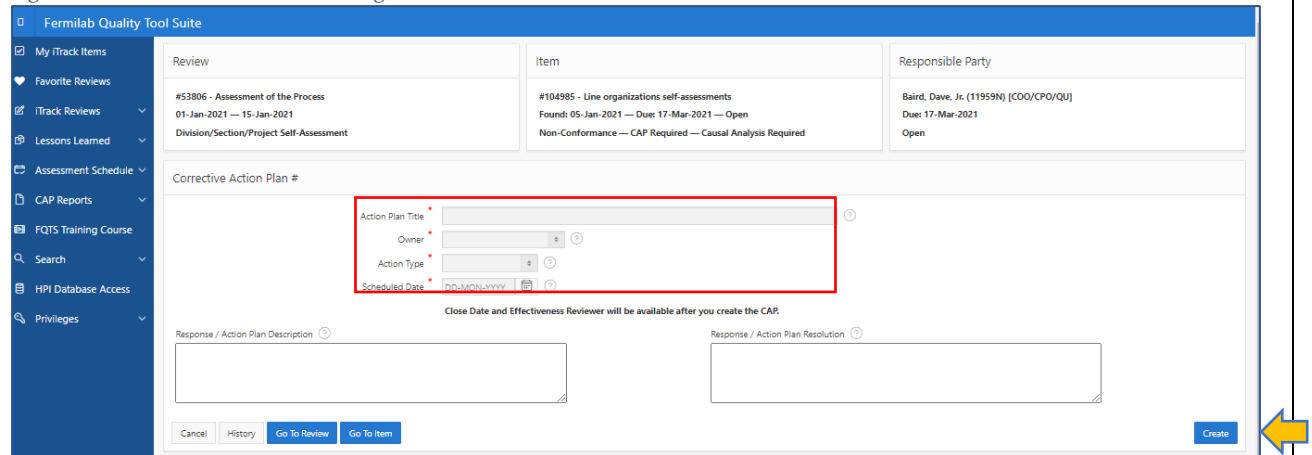
Steps to Create a Corrective Action Plan (CAP) (Figure 15a)

To create the CAP, complete the fields indicated by the red box.

1. **Action Plan Title*** – Enter a descriptive title for the action plan.
2. **Owner*** – From the dialog box, select the owner of this CAP.
3. **Action Type*** – Select the type of CAP from the drop down box.
4. **Scheduled Date*** – Enter the date the CAP will be completed.
5. Click **Create.**

Confirmation of the CAP will appear (Figure 15b). Repeat steps for additional CAPs. Remaining fields will be completed when the CAP is completed.

Figure 15a Corrective Action Plan Page



The screenshot displays the 'Fermilab Quality Tool Suite' interface. On the left is a blue sidebar with a list of navigation items. The main area is divided into sections: 'Review' (showing item #53806), 'Item' (showing item #104985), and 'Responsible Party' (Baird, Dave, Jr.). Below these is the 'Corrective Action Plan #' section. A red rectangle highlights the input fields for 'Action Plan Title', 'Owner', 'Action Type', and 'Scheduled Date'. Below the highlighted fields are two large text boxes for 'Response / Action Plan Description' and 'Response / Action Plan Resolution'. At the bottom of the form are buttons for 'Cancel', 'History', 'Go To Review', 'Go To Item', and a blue 'Create' button, which is indicated by a yellow arrow.


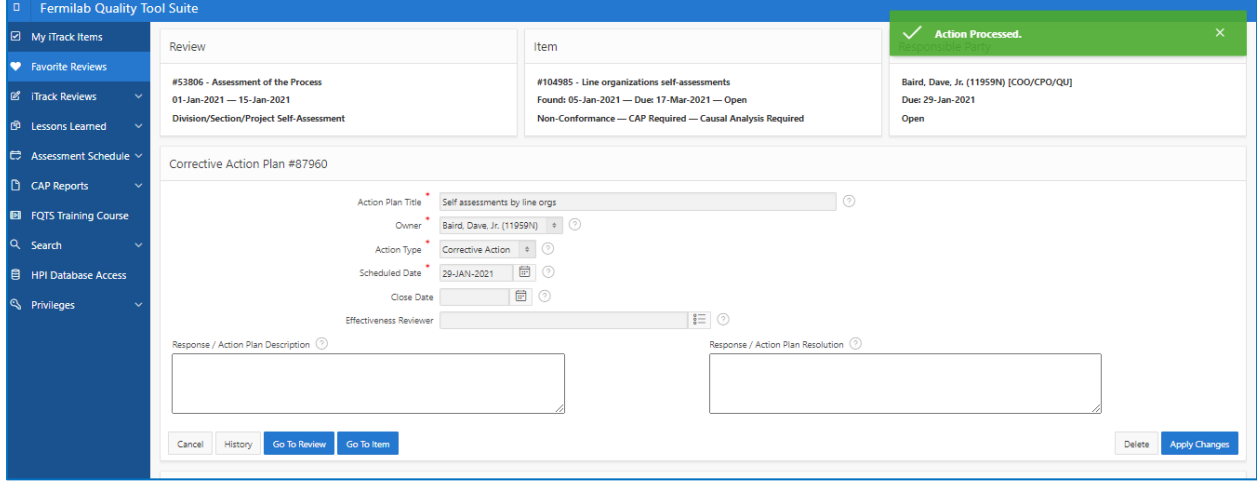
	<h2 style="text-align: center;">Quality Section Procedures</h2>	
Procedure Number/Name Fermilab Quality Tool Suite User Guide		Original Date:
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Figure 15b Corrective Action Plan Page – Confirmation of CAP Creation



Add information to **CAP**

The process to add hyperlinks and upload documents relevant to a CAP is the same as described in Section 6.2.1 (Figures 7 and 8) for adding hyperlinks and documents to a Review. Use the tabs at the lower left on the **Corrective Action Plan page** (Hyperlinks, Documents) to add or upload. The third tab on the CAP page is **Milestone**. to add a milestone. See below for steps to add one.

Add a **Milestone**

On the Corrective Action Plan page, click on the Milestones tab and **Create Milestones**; Figure 16a will open.

Steps to Add a Milestone to a CAP (Figure 16a)

1. **Sequence in Action Plan*** – Enter the number this milestone is in the order of the Item's milestones.
2. **Title*** – Enter a high-level description of the milestone.
3. **Scheduled Date*** – Enter the date the milestone is to be completed.
4. Click **Create**.

Confirmation that the Milestone was created will appear (Figure 16b).


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Figure 16a Milestone Page

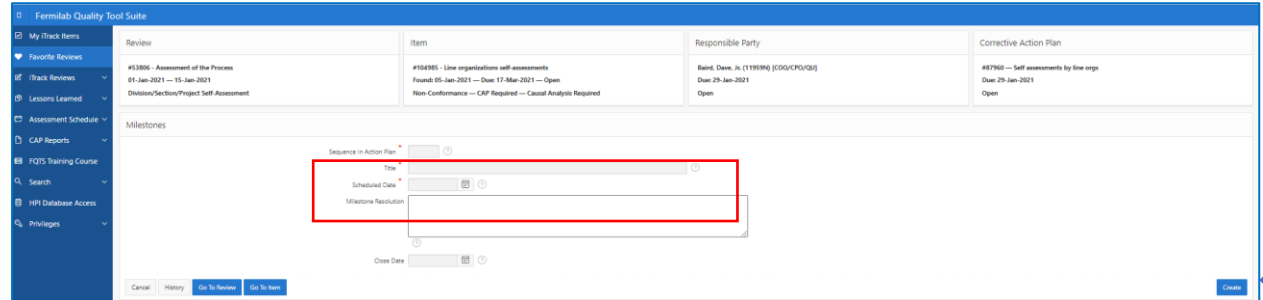
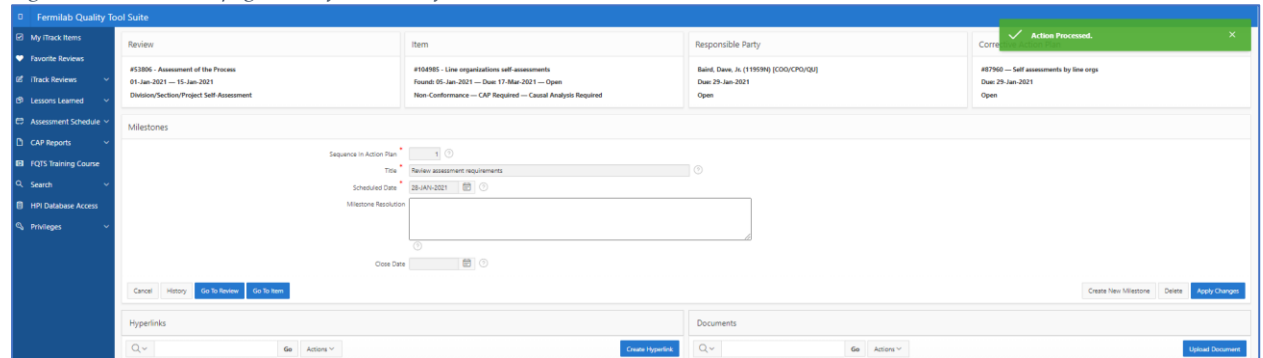



Figure 16b Milestone page – Confirmation of Milestone Creation



More Milestones may be added directly from the Milestone page by clicking the **Create a New Milestone** button and repeating the steps.

Hyperlinks and Documents relevant to the Milestone may be added through the Milestone page (16b). Click on **Create Hyperlink** or **Upload Document** to add a hyperlink or document. The steps are the same as described in Section 6.2.1, adding a hyperlink or document to a Review.

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Adding a Best Practice Item Type to a Review

Required information to add a Best Practice to a Review differs from the other Item types. Figures 17a and b walk through the steps to create a Best Practice. Start at the Review page (Figure 7a) and click on [Create Item](#).

Create a Best Practice Item Type (Figure 17a)

1. **Item Title*** – Descriptive title of the item or number assigned to the item from a DOE assessment.
2. **Item Type***³ –
Best Practice – A positive example of a work process or innovative approach with the potential to be the basis for significant operational improvements or cost savings.
3. **Item Category*** – Select the appropriate category from the drop-down box. This is not the cause of the issue but the category of the issue.
4. **Found In Organization*** – Select the Organization from the list in the drop-down where the Best Practice was found. The field to the right of this field will populate with departments within the selected Organization. This field may be used to be more specific. It is optional.
5. **Responsible Party*** – Select the person responsible for responding to this Item.
6. **Management System*** – From the drop-down box, select the Management System associated with this Item.
7. **Date Found*** – Enter the date the Item was found.
8. **Project or WBS#** – Optional field. Enter WBS# or Project-related #.
9. **Description*** – Describe the Best Practice so when referenced others can understand and adopt if applicable.
10. Click [Create](#)

Confirmation that a Best Practice Item Type created will appear (Figure 17b).

A Best Practice Item Type does not require a CAP and closes automatically upon creation.

Figure 17a Create a Best Practice Item Type

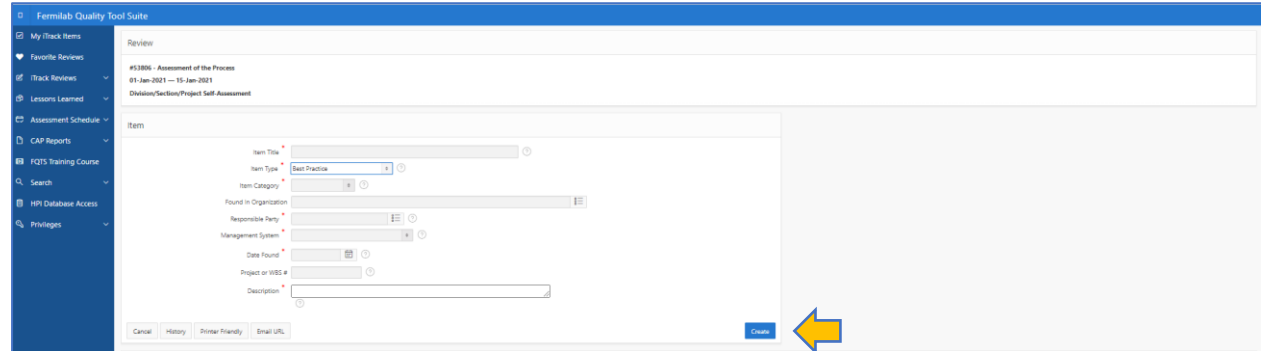
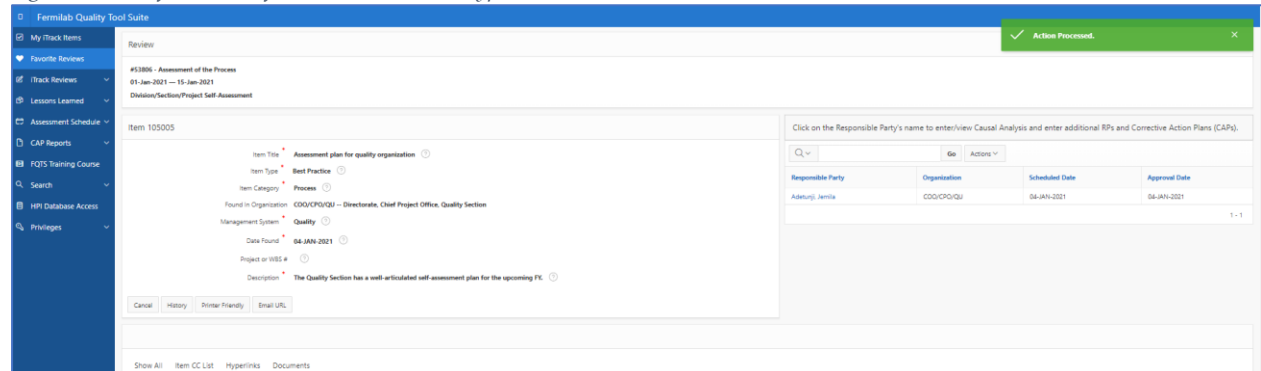


Figure 17b Confirmation of Best Practice Item Type Creation




A Lessons Learned Item type requires different information. Figures 18a and b detail the steps required to add a Lesson Learned to a Review. From the Review page, click **Create Item**.

Create a Lessons Learned Item Type (Figures 18a&b)

1. **Item Title*** – Descriptive title of the Lessons Learned.
2. **Item Type***³ – **Lessons Learned** – A best practice that is captured and shared to promote repeat application, or an adverse work practice or experience that is captured and shared to prevent recurrence.

Please note: Several fields change with a Lessons Learned Item Type: Item Category, hazard severity, mishap probability, and Project or WBS# disappear; new ones appear: Originator, Source, Source Type, Project/Experiment, Critical Decision, Keywords, Lessons Learned Topics, Work/Process Descriptions, and several Lessons Learned Narratives (two are required fields).

3. **Found in Organization*** – Select the Organization from the list where the Lessons Learned was found.

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4. **Responsible Party*** – Select the person responsible for responding to this Lessons Learned.
5. **Management System*** – From the drop-down box, select the Management System associated with this Lessons Learned.
6. **Originator*** – Free text entry. Enter the Lab/facility/source of the Lessons Learned. Examples are Fermilab, OPEXShare, Argonne.
7. **Source*** – Select the type of activity that was source the of this Lessons Learned.
8. **Source Type*** – Select either Internal or External for where the Lessons Learned occurred and if it was internal or external to Fermilab.
9. **Project/Experiment** – Select the project/experiment from the drop-down list, if applicable.
10. **Critical Decision** – Select from the drop-down list, if applicable.
11. **Date Found*** – Enter the date the Lessons Learned was found.
12. **Due Date*** – Enter the date the response to the Lessons Learned should be complete.
13. **Begin email reminders** – This will default to 1 month before the due date. This may be changed from one to six months by selecting from the drop-down list.
14. **Keywords*** – This is a free text field. Enter descriptive terms that will aid others when searching the database for similar Lessons Learned.
15. **Description*** – Describe the Lessons Learned so when referenced others can understand and apply the lesson.

Before clicking on the blue Create button, there are several required fields remaining for a Lessons Learned Item. Go to the Lessons Learned Topics.

16. ☐ **Send to all Subscribers** – Checking this box will inform the database to send Lessons Learned to all Lessons Learned database subscribers regardless of their selected subscription topics.
17. **Lessons Learned Topics*** – Select all relevant ones from the list. More than one may be selected.
18. **Work/Process Description*** – Select all relevant ones from the list. More than one may be selected.

*Go to the Lessons Learned Narrative fields. There are four different fields, two of them are required and identified with a **red asterisk**.*

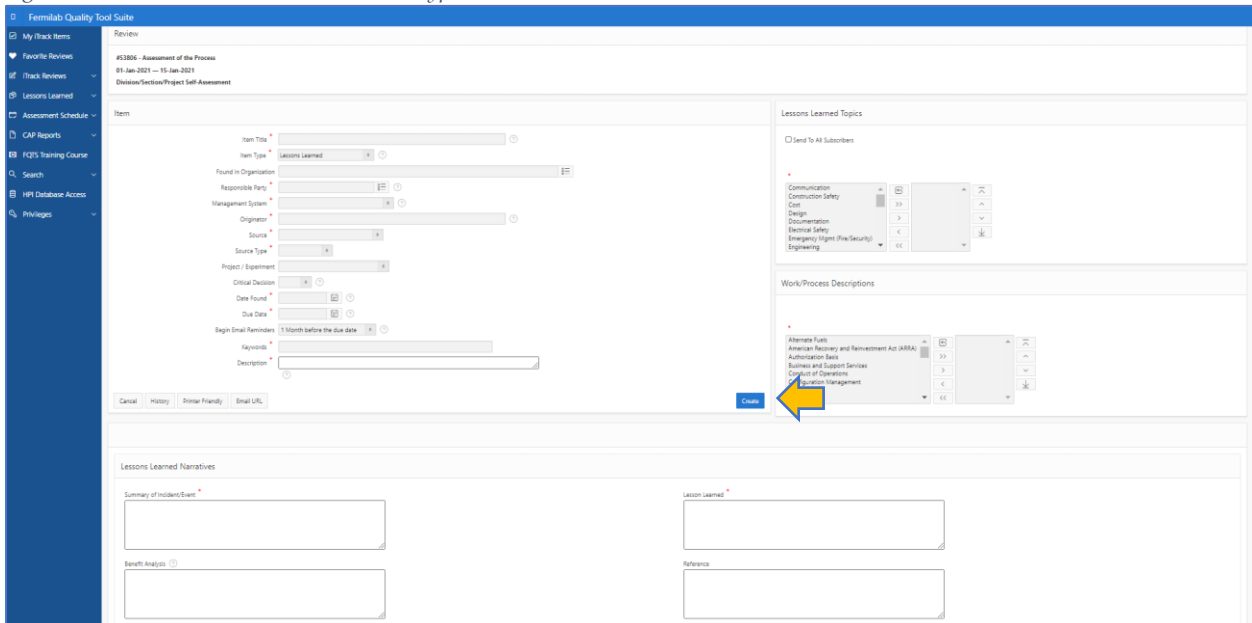
19. **Summary of Incident/Event*** – Describe the incident here.
20. **Lesson Learned*** – Describe the lesson from this particular event, assessment, or item.
21. **Benefit Analysis** – Optional. Describe the benefit to the laboratory of capturing these lessons learned. Enter any further analysis performed.

22. **Reference** – This is optional. Capture any reference source here.

23. Click [Create](#).

Confirmation that a Lesson Learned Item Type was created will appear (Figure 18b).

Figure 18a Create a Lessons Learned Item Type



The screenshot displays the 'Fermilab Quality Tool Suite' interface. On the left is a navigation menu with options like 'My Track Items', 'Favorite Reviews', 'Track Reviews', 'Lessons Learned', 'Assessment Schedule', 'CAP Reports', 'HQIS Training Course', 'Search', 'HPI Database Access', and 'Privileges'. The main area is titled 'Review' and shows details for a specific item: '#53826 - Assessment of the Process', dated '8th Jan 2021 - 15 Jan 2021', under the 'Division/Section/Project Self-Assessment' category. The 'Item' section contains various input fields: 'Item Title' (empty), 'Item Type' (set to 'Lessons Learned'), 'Found in Organization' (empty), 'Responsible Party' (empty), 'Management System' (empty), 'Originator' (empty), 'Source' (empty), 'Source Type' (empty), 'Project / Equipment' (empty), 'Critical Decision' (empty), 'Date Found' (empty), 'Due Date' (empty), 'Begin Email Reminders' (set to '1 Month before the due date'), 'Keywords' (empty), and 'Description' (empty). Below these fields are buttons for 'Cancel', 'History', 'Printer Friendly', and 'Email URL'. To the right, the 'Lessons Learned Topics' section includes a 'Send to All Subscribers' checkbox and a list of topics with counts: Communication (3), Construction Safety (3), Cost (3), Design (3), Documentation (3), Electrical Safety (3), Emergency (Fire/Security) (3), and Engineering (3). Below this is the 'Work/Process Descriptions' section with a list of organizational units: Alternate Fuel, American Recovery and Reinvestment Act (ARRA), Authorization Base, Business and Support Services, Support of Operations, and Location Management. At the bottom, the 'Lessons Learned Narratives' section has four text areas: 'Summary of Incident/Event', 'Lesson Learned', 'Benefits Analysis', and 'Reference'. A yellow arrow points to the 'Create' button located at the bottom right of the main form area.


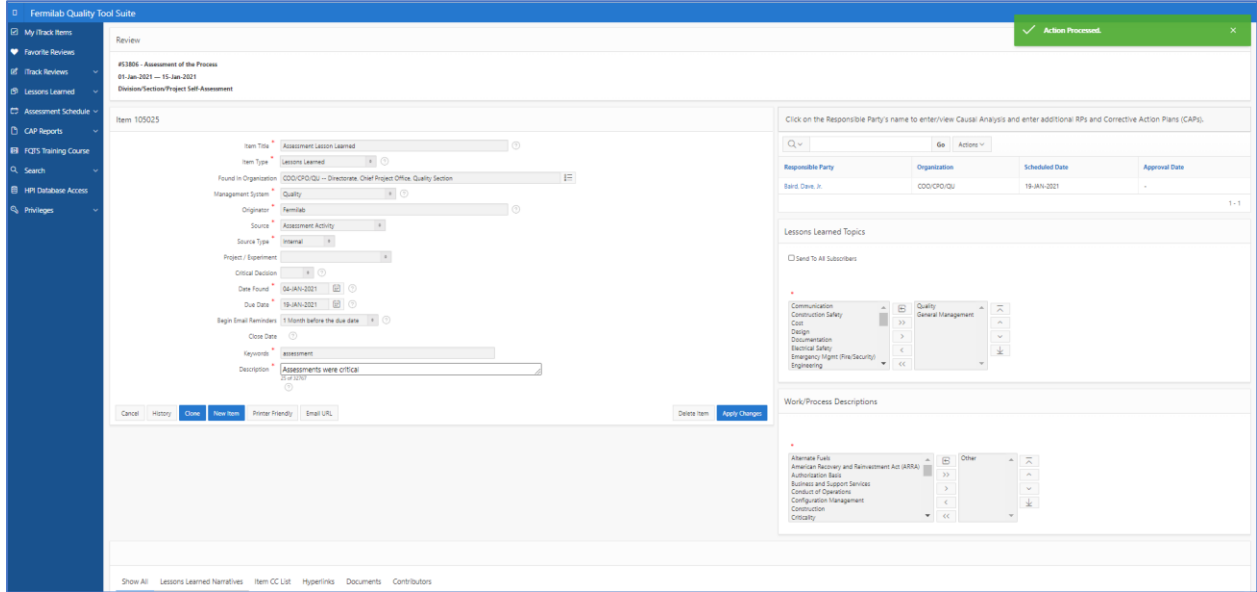
	<h1>Quality Section Procedures</h1>	
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Figure 18b Confirmation of Lessons Learned Item Type Creation



The screenshot displays the 'Review' page for a 'Lessons Learned' item (Item 105025) in the Fermilab Quality Tool Suite. The interface includes a sidebar with navigation links such as 'My Track Items', 'Favorite Reviews', 'Track Reviews', 'Lessons Learned', 'Assessment Schedule', 'CAP Reports', 'FQTS Training Course', 'Search', 'HPI Database Access', and 'Privileges'. The main content area shows the 'Review' page for Item 105025, which is an 'Assessment Lesson Learned'. The 'Item Type' is set to 'Lessons Learned'. The 'Found in Organization' is 'CDO/CPO/QU - Directorate, Chief Project Office, Quality Section'. The 'Management System' is 'Quality'. The 'Originator' is 'Fermilab'. The 'Source' is 'Assessment Activity'. The 'Project / Equipment' is 'Internal'. The 'Critical Decision' is 'Internal'. The 'Date Found' is '06-JUN-2021'. The 'Due Date' is '19-JUN-2021'. The 'Begin Email Reminders' is '1 Month before the due date'. The 'Close Date' is 'assessment'. The 'Keywords' are 'Assessments were critical'. The 'Description' is 'Assessments were critical'. On the right, there is a table for 'Lessons Learned Topics' and a section for 'Work/Process Descriptions'.

To add more information to the Best Practice or Lessons Learned Item Type, such as a cc List, hyperlinks, documents, CAPs, etc. the process is the same as previously described for the Nonconformance Item Type.

*Note the new tab, **Contributors**, on Figure 18b. Contributors are other Fermilab personnel who played a part in this Lessons Learned. The process to add their names is the same as adding a name to the CC List.*

6.3 Creating Lessons Learned Report

The Lessons Learned database is part of the FQTS and may be accessed through the Navigation bar by clicking on “Lessons Learned.”

6.3.1 Create a Lessons Learned Review

On the Lessons Learned homepage (Figure 19), click on **Create a Lessons Learned Report**. Figure 20a will open.


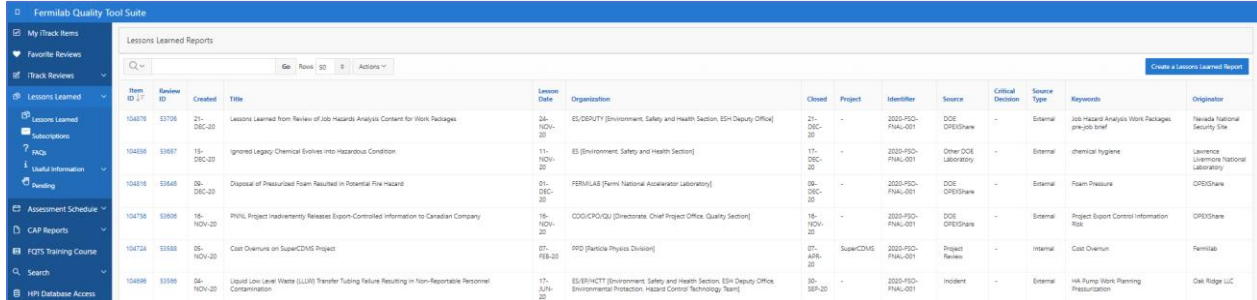
		Quality Section Procedures	
Procedure Number/Name Fermilab Quality Tool Suite User Guide			Original Date:
Written by: Mary Curtis	Reviewed/Updated By: Jemila Adetunji		Date: 23 March 2021

Figure 19 Lessons Learned Database Homepage



Item ID	Revision ID	Created	Title	Lesson Date	Organization	Closed	Project	Identifier	Source	Critical Decision	Source Type	Keywords	Originator
104678	53706	21-DEC-20	Lessons Learned from Review of Job Hazards Analysis Content for Work Packages	24-NOV-20	ES/DEPUTY (Environment, Safety and Health Section, ES+Deputy Office)	21-DEC-20	-	2020-PSO-PHAK-001	DOE OPEXShare	-	External	Job Hazard Analysis Work Packages, pre-job brief	Nevada National Security Site
104698	53687	15-DEC-20	Ignored Legacy Chemical Spills into Hazardous Condition	11-NOV-20	ES (Environment, Safety and Health Section)	17-DEC-20	-	2020-PSO-PHAK-001	Other DOE Laboratory	-	External	chemical hygiene	Lawrence Livermore National Laboratory
104618	53648	09-DEC-20	Disposal of Pressurized Foam Resulting in Potential Fire Hazard	01-DEC-20	FERMILAB (Fermi National Accelerator Laboratory)	09-DEC-20	-	2020-PSO-PHAK-001	DOE OPEXShare	-	External	Foam Pressure	OPEXShare
104758	53608	18-NOV-20	PNL Project inadvertently Releases Export-Controlled Information to Canadian Company	18-NOV-20	CGO/CRO/CI (Directorate, Chief Project Office, Quality Section)	18-NOV-20	-	2020-PSO-PHAK-001	DOE OPEXShare	-	External	Project Export Control Information Risk	OPEXShare
104724	53588	05-NOV-20	Cost Overrun on SuperCDMS Project	07-SEP-20	PPD (Particle Physics Division)	07-SEP-20	SuperCDMS	2020-PSO-PHAK-001	Project Review	-	Internal	Cost Overrun	Fermilab
104698	53588	04-NOV-20	Liquid Low Level Waste (LLW) Transfer Tubing Failure Resulting in Non-Reportable Personnel Contamination	17-AUG-20	ES/BIHCTT (Environment, Safety and Health Section, ES+Deputy Office, Environmental Protection, Hazard Control Technology Team)	30-SEP-20	-	2020-PSO-PHAK-001	Incident	-	External	HA Pump Work Planning, Precipitation	Oak Ridge LLC

Steps to create a Lessons Learned Report (Figure 20a&b)

1. **Title*** – Enter a descriptive title of the LL Record.
2. **Originator*** – Enter the Lab/facility/source of the Lesson Learned, e.g. Fermilab, OPEXShare.
3. **Source of Lesson Learned*** – From the drop-down list, select what activity this Lessons Learned came from.
4. **Organization*** – Select the Fermilab organization from the drop-down list. (Further specify organization with the second drop-down list to the right of this entry.)
5. **Lesson Date*** – Enter the date the lesson was found.
6. **Management System*** – Select the MS this Lessons Learned applies to.
7. **Contact Person*** – Select the Fermilab contact for this Lessons Learned.
8. **Project/Experiment** – Select the project/experiment, if applicable.
9. **Critical Decision** – For Lessons Learned derived from Projects, select the associated CD point.
10. **DocDB Link** – Optional. Enter the link to the DocDB record related to this Lessons Learned.
11. **Source Type*** – Identify if the source is internal or external to Fermilab.
12. **Keywords*** – Enter keywords that will help identify this Lessons Learned in a future search.
13. **Begin email reminders** – This is an optional entry to document how far in advance from the due date you want to receive reminders. This will default to 1 month before the due date and may be changed from one to six months by selecting from the drop-down list.
14. ☐ **Send to all Subscribers** – Checking this box will inform the database to send this Lessons Learned to all Lessons Learned database subscribers regardless of their selected subscription topics.
15. **Lessons Learned Topic*** – Select the LL topic(s) from the associated list. More than one may be selected.
16. **Work/Process Description*** – Select the work/process description(s) that relates to the Lessons Learned. More than one may be selected.
17. **Summary of Incident/Event*** – Describe the incident.

18. **Lesson Learned*** – Describe the lesson or the “take away” from the incident or event – what is the lesson learned?
19. **Benefit Analysis** – Optional field. Enter information regarding why this lesson learned is beneficial to capture for the lab.
20. **Reference** – Optional field. Capture additional reference sources here such as a link to associated documents or materials.
21. Click [Create](#).

Figure 20a Create a Lessons Learned Review Page

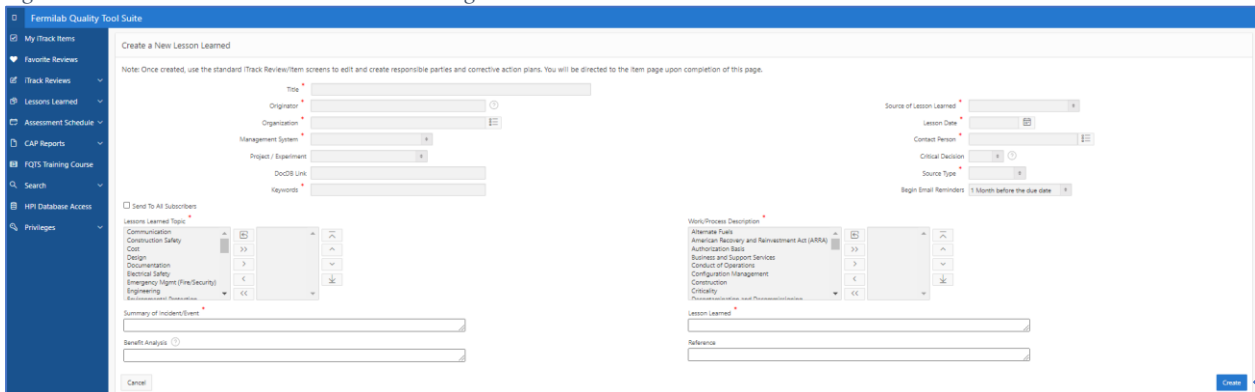
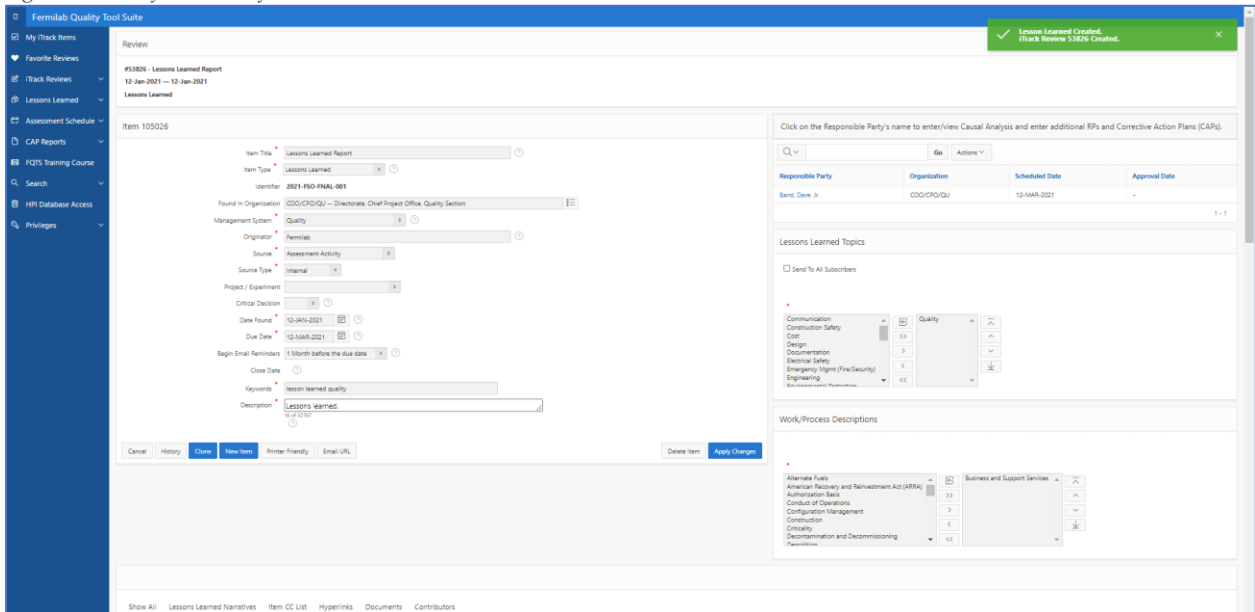



Figure 20b Confirmation of a Lessons Learn Review Created



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When a Lessons Learned Review is created, the database automatically creates a Lessons Learned Item Type for the Lessons Learned Review (Figure 20b), resulting in a Lessons Learned Item Type within a Lessons Learned Review. Editing or adding new information to the Lessons Learned Review or Item Type follows the same steps previously described for entering information into a Review or an Item (Sections [6.2.1](#) or [6.2.2](#)). If there is no further action required, this Lessons Learned Item type may be closed immediately by opening the Responsible Party page and entering the approval date. If action is required, such as disseminating the Lessons Learned information to a specific organization or group, create a Corrective Action Plan (CAP) from this page to record the action, scheduled (due) date and owner (responsible party). ([Section 6.2.3](#))

6.4 Update/Close Records

To close an Item in iTrack or Lessons Learned database, any Milestones created **must be closed first**, then Corrective Action Plans can be closed, then the Item can be closed.

6.4.1 Update/Close a Milestone

To get to the Milestone, open the Item –> Corrective Action Plan –> Milestone.

Open the **Item page**. To access it, find it in the “My iTrack Items,” or open the **Review page** via the iTrack Reviews link on the Navigation bar and click on the pencil next to the Item ID. Access the Corrective Action Plan by clicking on the [Responsible Party name](#) (Figure 21). The **Responsible Party page** (Figure 22) will open. Click the pencil next to the Corrective Action Plan to open the **Corrective Action Plan page** (Figure 23). Click the pencil next to the Milestone. This will open the **Milestone page** (Figure 24a).


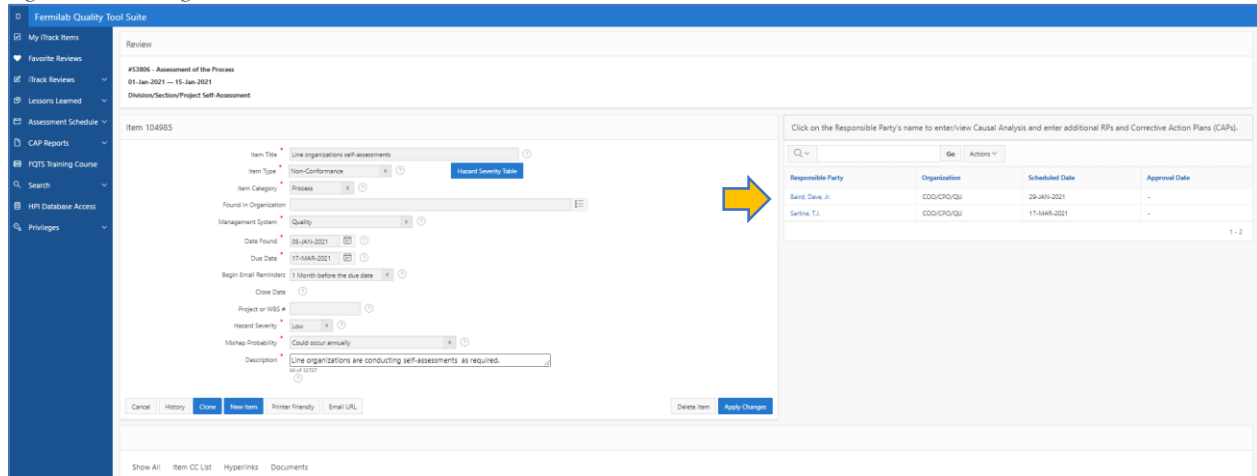
	<h1>Quality Section Procedures</h1>	
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Figure 21 Item Page



Review

#15895 - Assessment of the Process
01-Jan-2021 -- 15-Jan-2021
Division/Section/Project Self-Assessment

Item 104595

Item Title: Line organizations self-assessments
Item Type: Non-Conformance
Item Category: Process
Found in Organization: [text field]
Management System: Quality
Data Found: 05-JAN-2021
Due Date: 07-MAR-2021
Begin Email Reminders: 15 Month before the due date
Close Date: [text field]
Project or WBS: [text field]
Hazard Severity: Low
Misstep Probability: Could occur annually
Description: Line organizations are conducting self-assessments as required.

Click on the Responsible Party's name to enter/view Causal Analysis and enter additional RPs and Corrective Action Plans (CAPs).

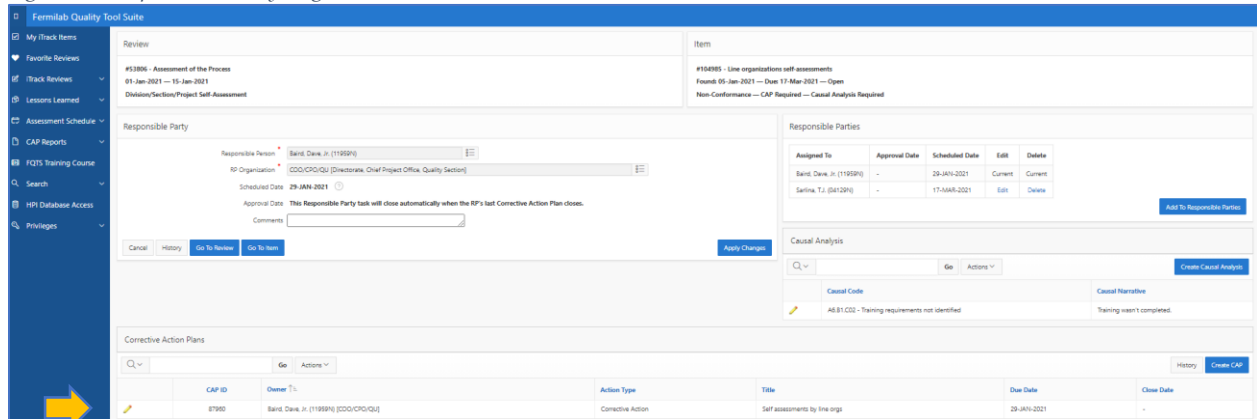
Responsible Party	Organization	Scheduled Date	Approval Date
Baird, Dave, Jr.	CCO/CPO/Qu	29-JAN-2021	-
Serina, T.J.	CCO/CPO/Qu	17-MAR-2021	-

1 - 2

Cancel History Close New Item Print Friendly Email URL Delete Item Apply Changes

Show All Item CC List Hyperlinks Documents

Figure 22 Responsible Party Page



Review

#15895 - Assessment of the Process
01-Jan-2021 -- 15-Jan-2021
Division/Section/Project Self-Assessment

Item

#15895 - Line organizations self assessments
Found: 05-Jan-2021 -- Due: 17-Mar-2021 -- Open
Non-Conformance -- CAP Required -- Causal Analysis Required

Responsible Party

Responsible Person: Baird, Dave, Jr. (11959P)
RP Organization: CCO/CPO/Qu (Directorate, Chief Project Office, Quality Section)
Scheduled Date: 29-JAN-2021
Approval Date: This Responsible Party task will close automatically when the RP's last Corrective Action Plan closes.
Comments: [text field]

Responsible Parties

Assigned To	Approval Date	Scheduled Date	Edit	Delete
Baird, Dave, Jr. (11959P)	-	29-JAN-2021	Current	Current
Serina, T.J. (0412R)	-	17-MAR-2021	Edit	Delete

Add To Responsible Parties

Causal Analysis

Causal Code: A5.B1.C02 - Training requirements not identified
Causal Narrative: Training wasn't completed.

Corrective Action Plans

CAP ID	Owner	Action Type	Title	Due Date	Close Date
87960	Baird, Dave, Jr. (11959P) [CCO/CPO/Qu]	Corrective Action	Self assessments by line orgs	29-JAN-2021	-

History Create CAP


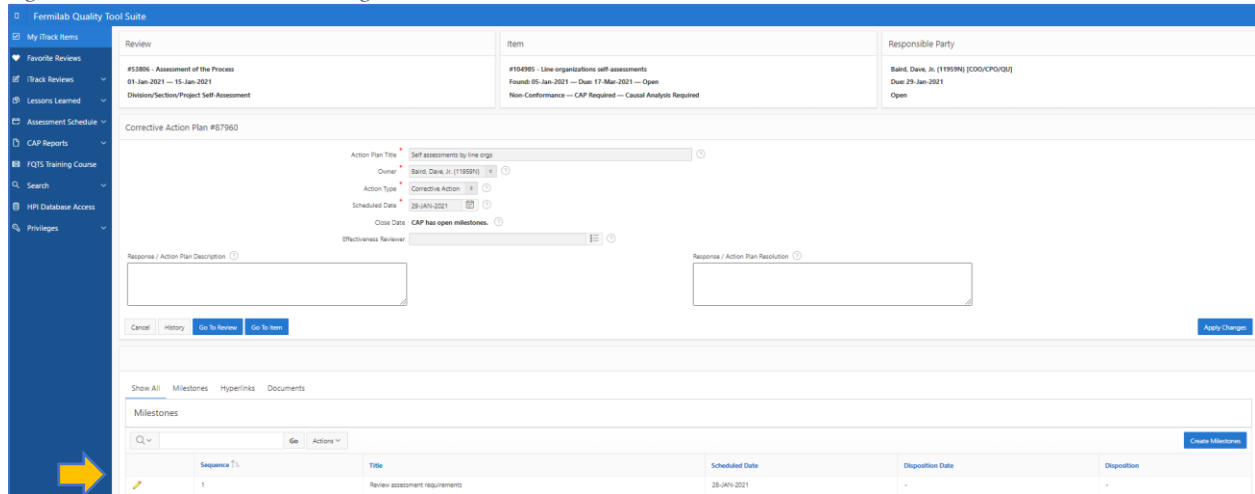
	<h2 style="text-align: center;">Quality Section Procedures</h2>	
Procedure Number/Name Fermilab Quality Tool Suite User Guide		Original Date:
Written by: Mary Curtis	Reviewed/Updated By: Jemila Adetunji	Date: 23 March 2021

Figure 23 Corrective Action Plan Page



Steps to Close Milestones (Figure 24a,b&c)

Sequence in Action Plan, Title, and Scheduled Date will be pre-populated with previous entries. Complete the following information to close the Milestone.

1. **Milestone Resolution** – Enter a high-level description of result.
2. **Close Date** – Enter date milestone was completed.
3. Click **Apply Changes**

The Milestone will be closed as confirmed by the green “Action Processed” box (Figure 24b). A second way to confirm is to return to the Corrective Action Page (click Cancel) and see the “Disposition date” on the Milestone table (Figure 24c).

Figure 24a Milestone Page

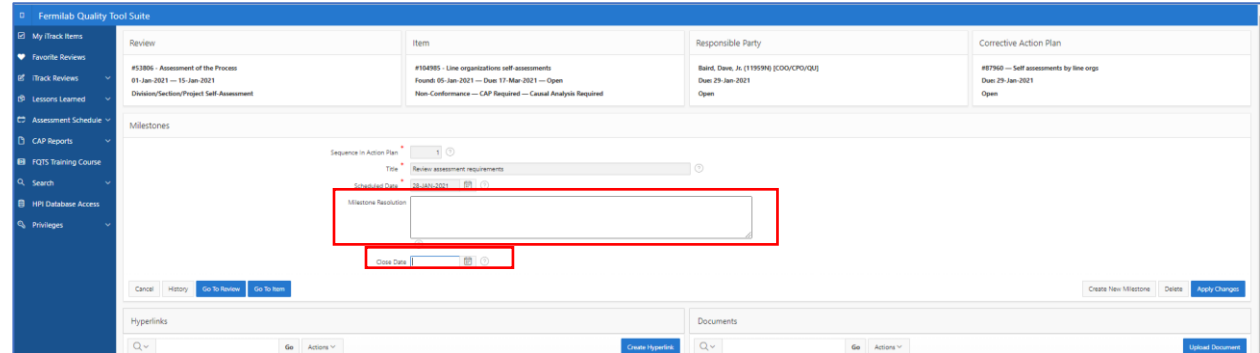


Figure 24b Confirmation of Milestone Closing

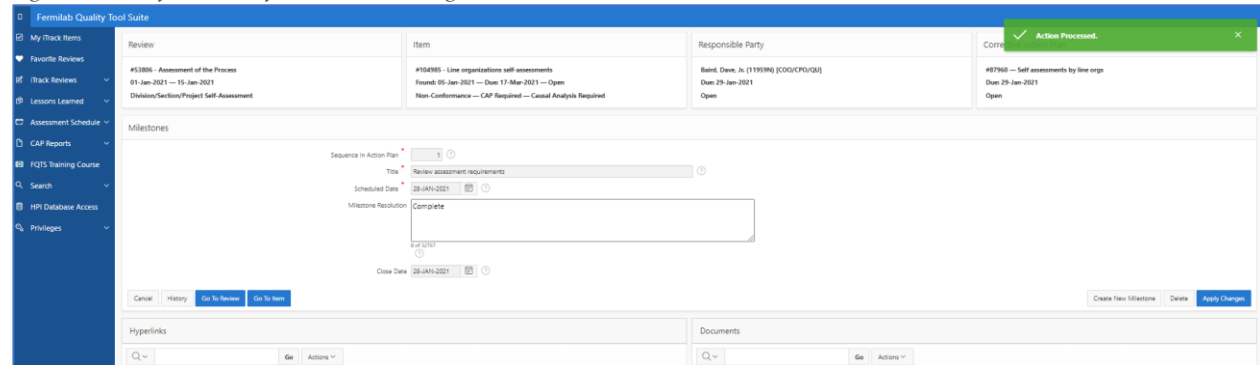
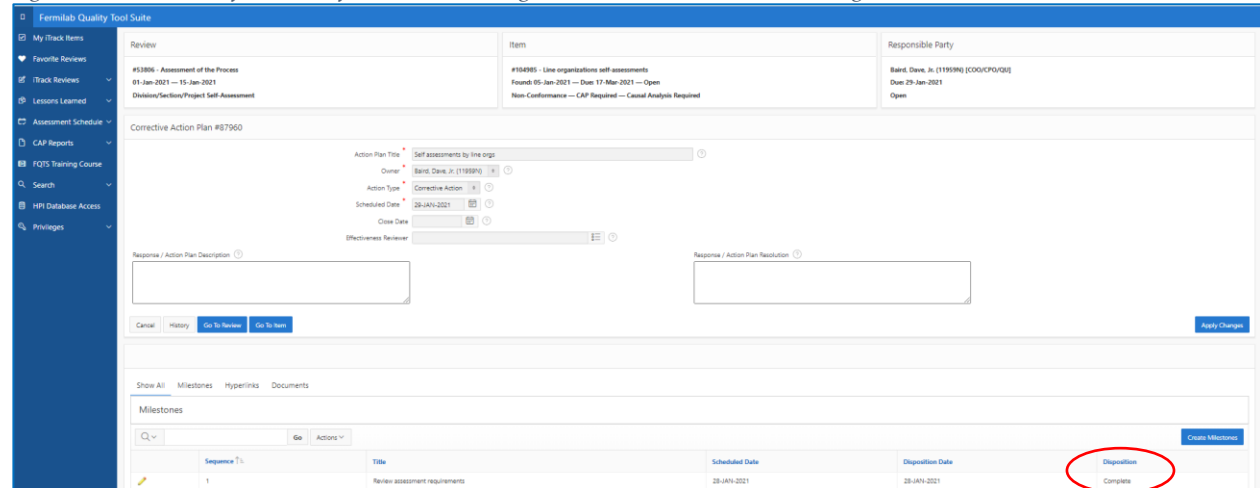


Figure 24c Second Confirmation of Milestone Closing – The Corrective Action Plan Page



6.4.2 Update/Close a CAP

Open the **Corrective Action** page (Figure 25a) to close the Corrective Action Plan.

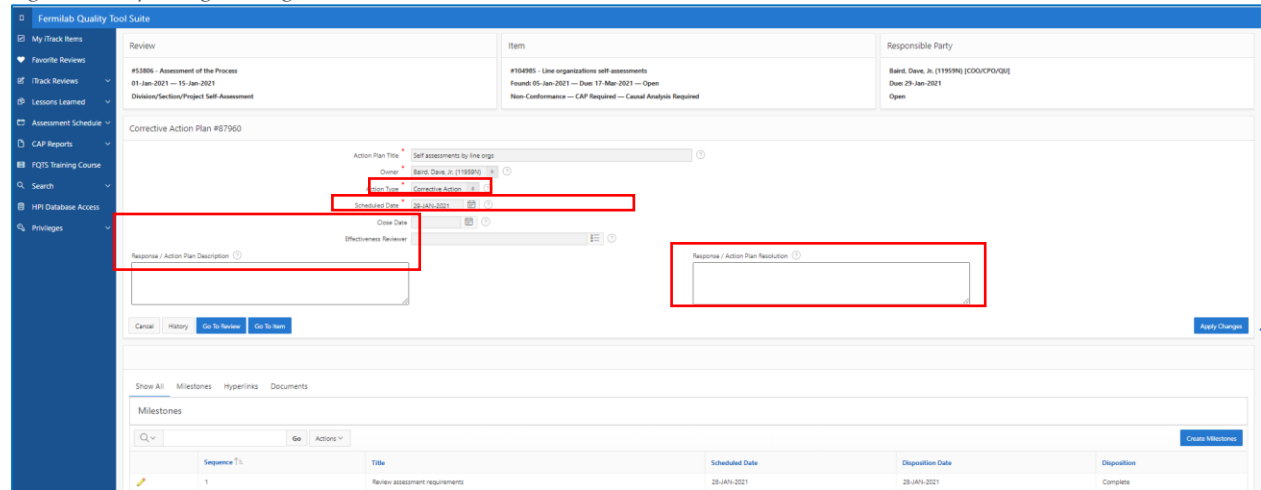
Steps to Close a CAP (Figure 25a)

Action Plan Title, Owner, Action Type, and Scheduled Date will be pre-populated. Complete the entries noted in red boxes.

1. **Close Date** – Date actions were completed.
2. **Effectiveness Reviewer** – Required for a CAP addressing a nonconformance or management concern. Select the individual who will be notified after 90-days to review the CAP for effectiveness in addressing the issue. This cannot be the RP.
3. **Response/Action Plan Description** – Describe the action taken to resolve the Item.
4. **Response/Action Plan Resolution*** – Describe the actions taken to resolve the corrective or preventive action or response.
5. Click **Apply Changes**.

Confirmation that the CAP was updated/closed will appear (Figure 25b).

Figure 25a Updating/Closing a Corrective Action Plan

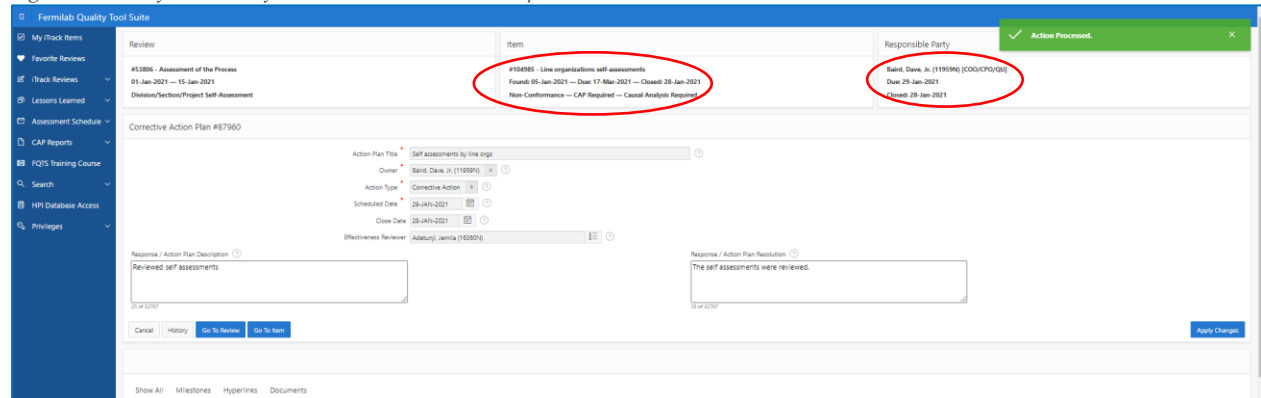


The screenshot shows the 'Fermilab Quality Tool Suite' interface. The main content area displays the 'Corrective Action Plan #67960' form. The form is pre-populated with the following information:

- Action Plan Title:** Self assessments by line orgs
- Owner:** Baird, Steve, Jr. (119596)
- Action Type:** Corrective Action
- Scheduled Date:** 28-Jan-2021
- Close Date:** (empty field)
- Effectiveness Reviewer:** (empty dropdown)
- Response / Action Plan Description:** (empty text area)
- Response / Action Plan Resolution:** (empty text area)

Red boxes highlight the 'Close Date' field, the 'Effectiveness Reviewer' dropdown, the 'Response / Action Plan Description' text area, and the 'Response / Action Plan Resolution' text area. A yellow arrow points to the 'Apply Changes' button at the bottom right.


Figure 25b Confirmation of Corrective Action Plan Updated/Closed



The screenshot shows the 'Fermilab Quality Tool Suite' interface after the CAP has been updated/closed. The main content area displays the 'Corrective Action Plan #67960' form. The form is now populated with the following information:

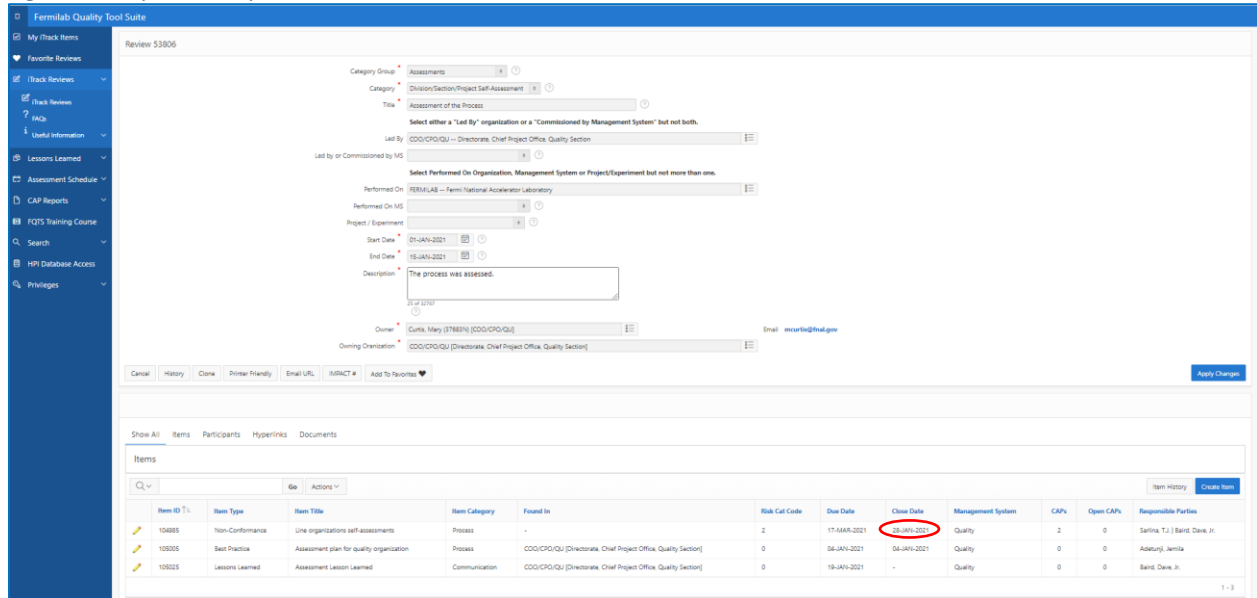
- Action Plan Title:** Self assessments by line orgs
- Owner:** Baird, Steve, Jr. (119596)
- Action Type:** Corrective Action
- Scheduled Date:** 28-Jan-2021
- Close Date:** 28-Jan-2021
- Effectiveness Reviewer:** Adetunji, Jemila (155025)
- Response / Action Plan Description:** Reviewed self assessments
- Response / Action Plan Resolution:** The self assessments were reviewed.

A green 'Action Processed' message is visible at the top right. Red circles highlight the 'Close Date' field, the 'Effectiveness Reviewer' dropdown, and the 'Response / Action Plan Resolution' text area.

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With closure of the Milestone and the Corrective Action Plan, the Item is now closed. To confirm, access the **Review** page and note the status of the Item. (Figure 26)

Figure 26 Confirmation of Closed Item

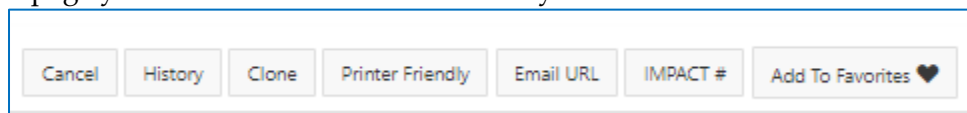


Item ID	Item Type	Item Title	Item Category	Found In	Risk Cat Code	Due Date	Close Date	Management System	CAPs	Open CAPs	Responsible Parties
10685	Non-Conformance	Line organizations self-assessments	Process	-	2	17-MAR-2021	25-JAN-2021	Quality	2	0	Sarina T.J. David Davis, Jr.
10605	Best Practice	Assessment plan for quality organization	Process	CCO/CPO/QU (Directorate, Chief Project Office, Quality Section)	0	04-JAN-2021	04-JAN-2021	Quality	0	0	Adetunji, Jemila
106025	Lessons Learned	Assessment Lesson Learned	Communication	CCO/CPO/QU (Directorate, Chief Project Office, Quality Section)	0	19-JAN-2021	-	Quality	0	0	David Davis, Jr.

7.0 OTHER ACTIONS

7.1 Cancel Button


The **Cancel** button on every page is the back button. Hover over it and a pop-out will display the name of the page you will be directed to. Click and you will be directed to the described page.



7.2 History

The **History** button displays a list of all changes made to the page.

7.3 Email URL

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The [Email URL](#) button provides a way to directly email the record to an interested party. When you click on it, your email program will open and ask for a recipient for the message.

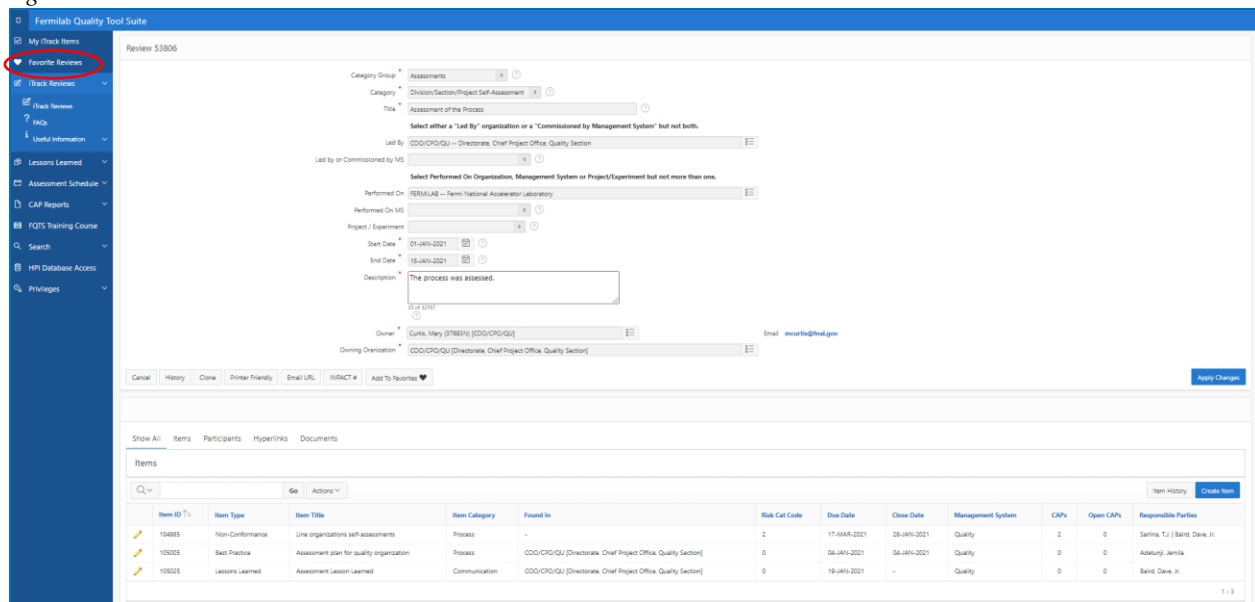
7.4 IMPACT#

The [IMPACT #](#) button provides a direct link to the IMPACT database. See [Impact User Guide](#).

7.5 Add to Favorites

The [Add to Favorites](#) Button is a way to bookmark the Review. After the first time it's used, a new link will appear on your Navigation Bar. See Figure 27.

Figure 27 The Favorites Link



Item ID	Item Type	Item Title	Item Category	Found In	Risk Cat Code	Due Date	Close Date	Management System	CAPs	Open CAPs	Responsible Parties
156885	Non-Conformance	Line organizations self assessments	Process	-	2	17-MAR-2021	28-JAN-2021	Quality	2	0	Sarina, T.J. / Band, Dave, Jr.
100005	Best Practice	Assessment plan for quality organization	Process	COO/CPO/QU [Directorate, Chief Project Office, Quality Section]	0	04-JAN-2021	04-JAN-2021	Quality	0	0	Adetunji, Jemila
100025	Lessons Learned	Assessment Lesson Learned	Communication	COO/CPO/QU [Directorate, Chief Project Office, Quality Section]	0	19-JAN-2021	-	Quality	0	0	Band, Dave, Jr.

7.6 Re-open Action Plans/Responses

To re-open a closed Item, open the Item's page by finding it under "My iTrack Items" on the Navigation bar. Click the pencil next to the Item ID -> click on the [Responsible Party's](#) name to access the **Corrective Action Plan** page -> click the pencil next to the CAP ID. Figure 28a will open. To re-open the Item, complete the noted entries.

Steps to re-open a Corrective Action Plan/Response. (Figure 28a)

1. **Close date** – Delete.
2. Click **Apply Changes**.

Confirmation of the reopened CAP will appear (Figure 28b).

Figure 28a Closed Corrective Action Plan page

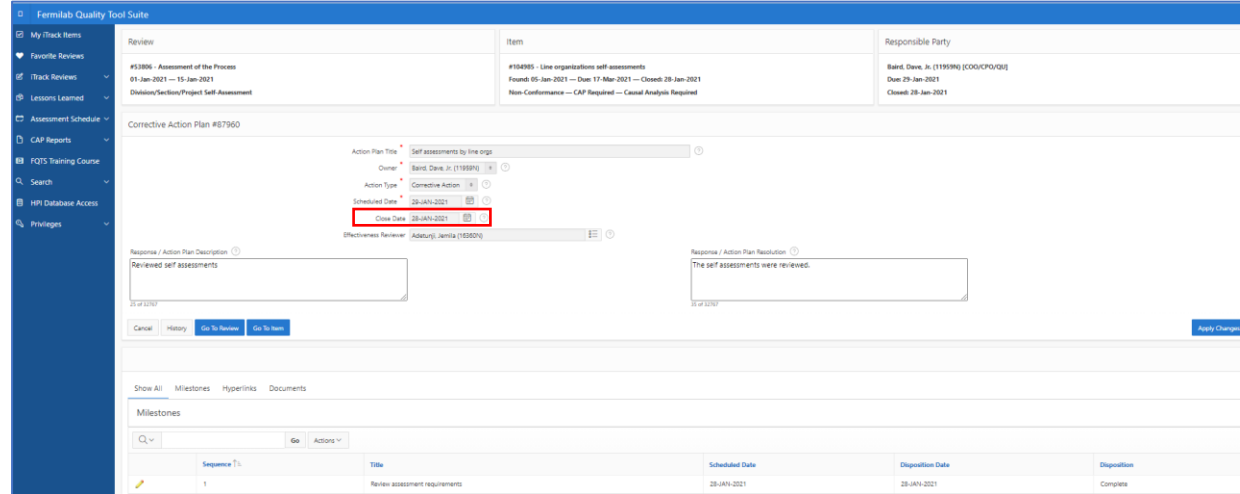
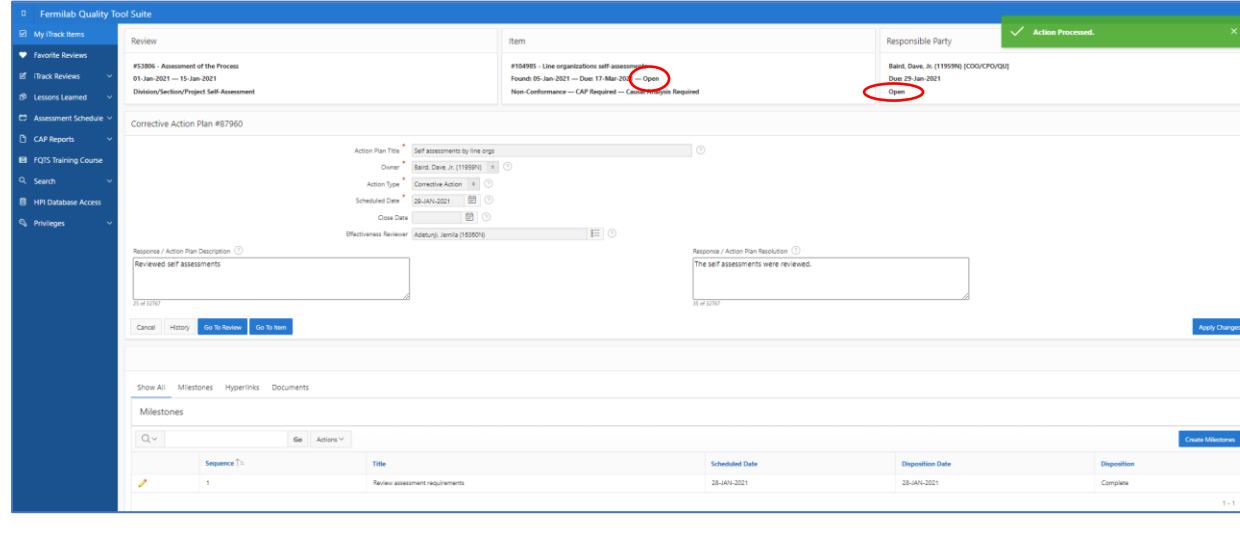



Figure 28b Confirmation of Reopened CAP



7.7 Re-open a Milestone

To re-open a closed Milestone, open the Item's page by finding it under "My iTrack Items" on the Navigation bar. Click the pencil next to the Item ID -> click on the **Responsible party's** name

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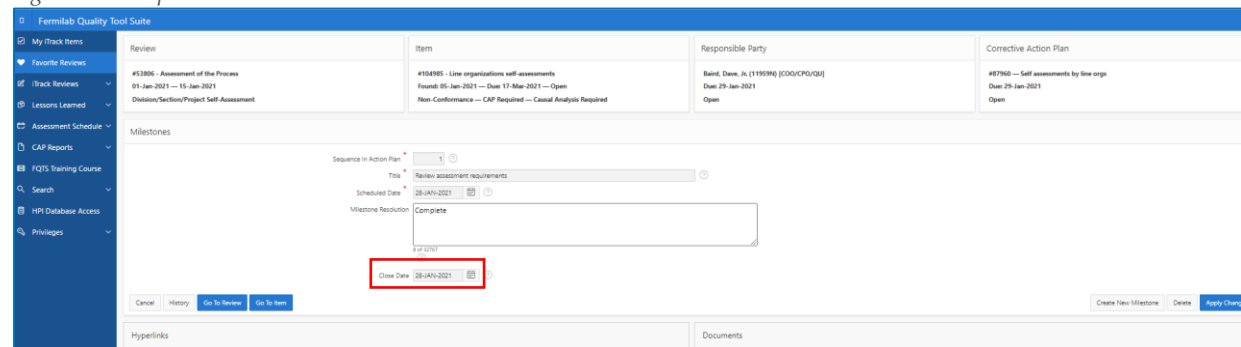
to access the Corrective Action Plan page->click the pencil next to the CAP ID->the pencil next to the Milestone. Figure 29a will open. To re-open the Milestone, complete the noted entries.

Steps to Re-open a Milestone (Figure 29a)

1. **Close Date** – Delete
2. Click **Apply Changes**

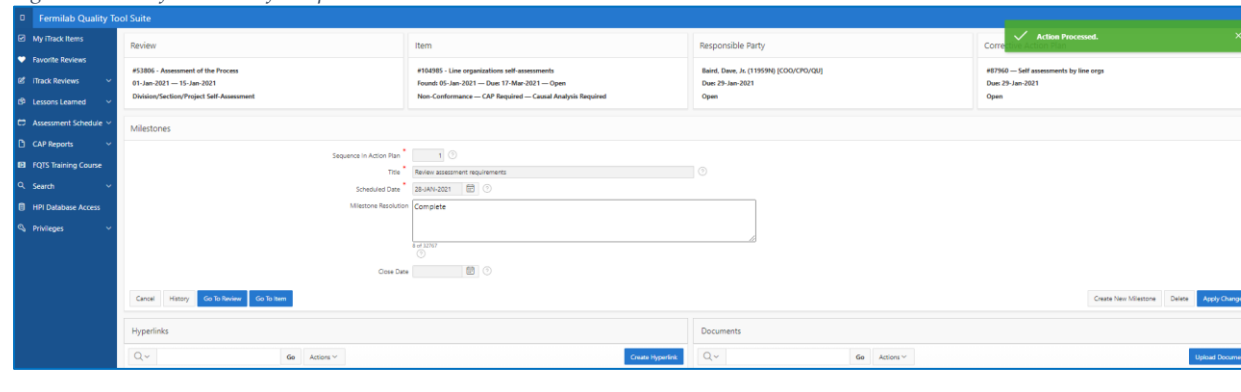
Confirmation of Milestone reopening will appear. (Figure 29b)

Figure 29a Reopen a Milestone



The screenshot shows the 'Fermilab Quality Tool Suite' interface. On the left is a navigation menu with options like 'My Track Items', 'Favorite Reviews', 'Track Reviews', 'Lessons Learned', 'Assessment Schedule', 'CAP Reports', 'FQTS Training Course', 'Search', 'HPI Database Access', and 'Privileges'. The main content area is titled 'Milestones' and contains a form with fields for 'Sequence in Action Plan' (set to 1), 'Title' (Review assessment requirements), 'Scheduled Date' (28-Jan-2021), and 'Milestone Resolution' (Complete). Below these fields is a 'Close Date' field with a calendar icon, which is highlighted by a red box. At the bottom right of the form is a blue 'Apply Changes' button, indicated by a yellow arrow. Other buttons include 'Cancel', 'History', 'Go To Review', 'Go To Item', 'Create New Milestone', and 'Delete'.


Figure 29b Confirmation of Reopened Milestone



This screenshot shows the same 'Milestones' form as Figure 29a, but with a green confirmation message 'Action Processed.' displayed at the top right. The 'Close Date' field is now empty, and the 'Apply Changes' button has been updated to 'Update Milestone'.

7.8 Cloning – Review and Items

More than one Review may contain similar information; to avoid entering the same information numerous times, FQTS has a cloning feature that copies and pastes information from a selected Review into a new Review. This new Review may be edited with specific information.

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To clone a Review, click the [Clone](#) tab on the **Review** page. A new Review will be created with all the original Review information. Corrective Action Plans, documents, hyperlinks, milestones, etc. that were in the original Review will not be cloned into the new Review. The new Review may be edited and information added accordingly.

More than one Item may also contain similar information; to avoid entering this same information numerous times, Items may be cloned within the Review.

To clone an Item, click the [Clone](#) button on the Item page. A new Item will be created with most of the original Item information (excluding the Title, Responsible Party name, Description, CAPs) cloned from the original. The missing entries must be completed in the same process as described above, and the cloned record saved.

7.9 Change Due Dates

To update or change scheduled dates for Items, Corrective Action Plans or Milestones, go to the Item page.

7.9.1 Change Item Due Date

To change the Item due date, change it on the page and click [Apply Changes](#)

7.9.2 Change CAP scheduled date

To change a CAP due date, access the Responsible Party page (via the [Responsible party's](#) name on the Item page). Access the CAP page (by clicking the pencil next to the CAP ID)

Steps to Update Scheduled Dates (Figure 30a)

1. **Scheduled Date *** – Update to the new date.
2. Click [Apply Changes](#)

If the new due date is beyond the Item's due date, you will receive an error notice that you must provide a reason for the extension. (Figure 30b)

Figure 30a Extend Scheduled Date

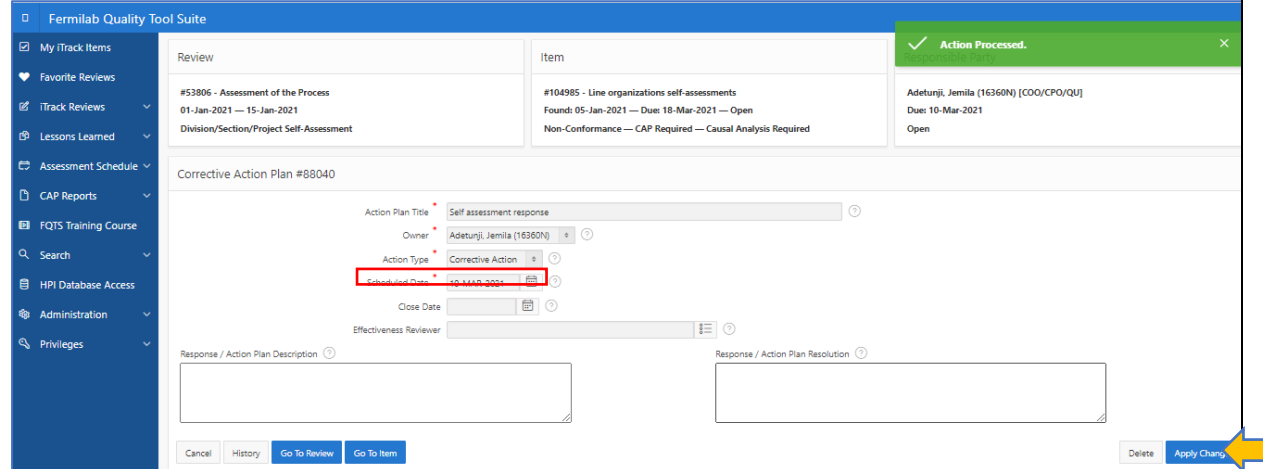
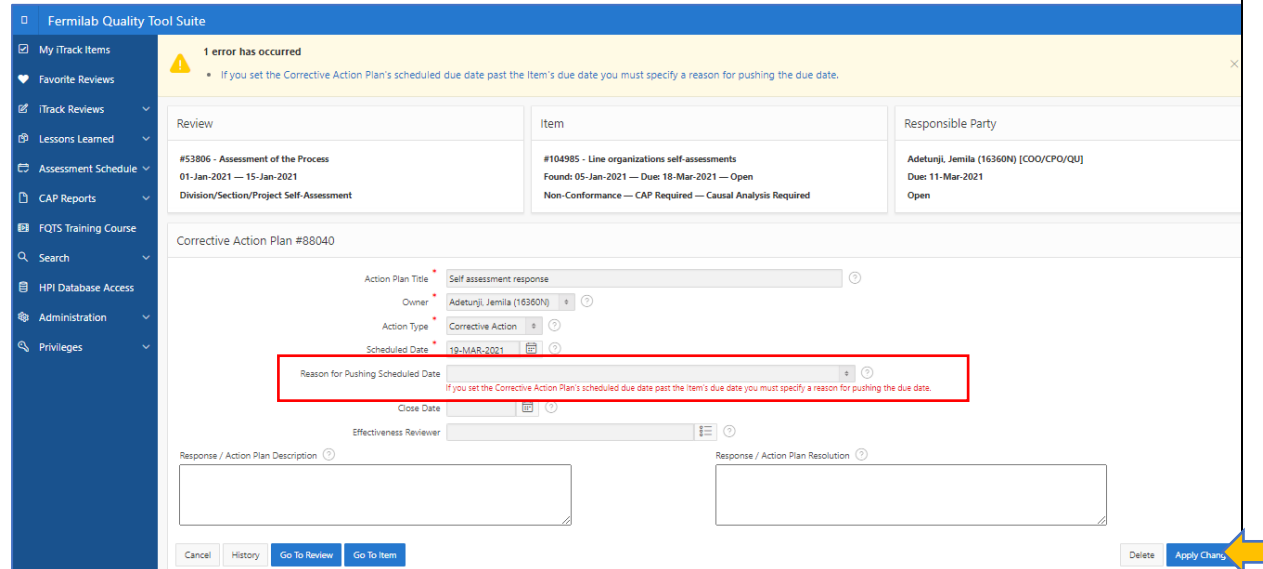


Figure 30b Extension of CAP due date, reason required error



1. **Reason for Pushing Scheduled Date** – Use the drop-down box to select the reason for changing the date.
2. Click **Apply Changes**

Confirmation of updated schedule dates will appear (Figure 30c).


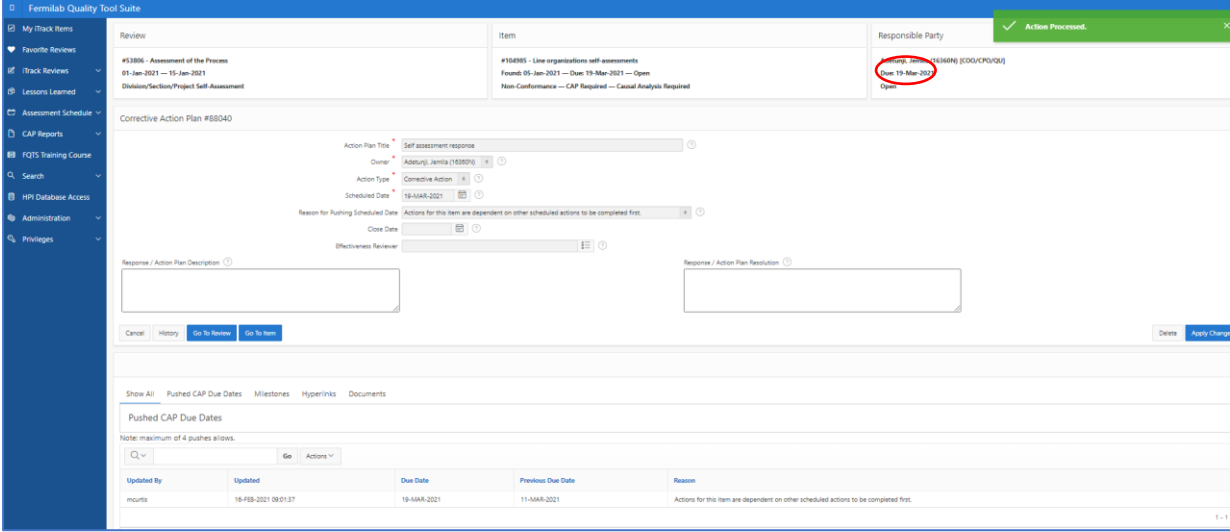
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Figure 30c Confirmation of Updated Scheduled Date



The screenshot displays the Fermilab Quality Tool Suite interface. The left navigation bar includes options like 'My iTrack Items', 'Favorite Reviews', 'iTrack Reviews', 'Lessons Learned', 'Assessment Schedule', 'CAP Reports', 'FQTS Training Course', 'Search', 'HPI Database Access', 'Administration', and 'Privileges'. The main content area shows a 'Review' tab for a specific item. The 'Responsible Party' section is highlighted with a red circle, showing the 'Due Date' as '19-MAR-2021'. Below this, the 'Pushed CAP Due Dates' section is visible, containing a table with columns for 'Updated By', 'Updated', 'Due Date', 'Previous Due Date', and 'Reason'. The table lists a single entry with a due date of '19-MAR-2021' and a reason: 'Actions for this item are dependent on other scheduled actions to be completed first.'

Updated By	Updated	Due Date	Previous Due Date	Reason
mcurtis	18-FEB-2021 09:01:07	19-MAR-2021	19-MAR-2021	Actions for this item are dependent on other scheduled actions to be completed first.

Note: A list of extended dates and the reasons for the extension appear on this page. The number of extensions is capped at four. After the CAP due date has been pushed back four times, it can no longer be changes and the CAP Status will be Past Due until it is closed.

8.0 SEARCHING iTRACK

On the Navigation bar, select “Search” to open the seven different search options.(Figure 31).


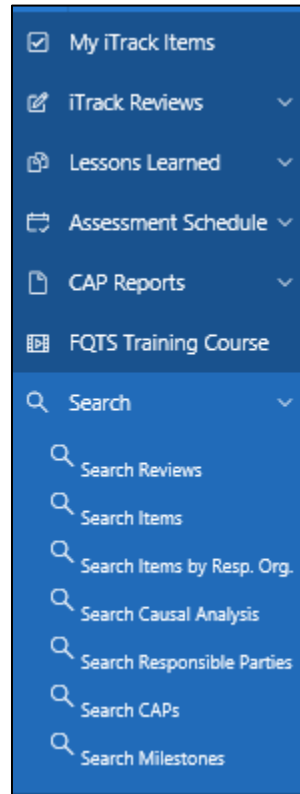
	<h2 style="text-align: center;">Quality Section Procedures</h2>	
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Figure 31 Search Functions



8.1 Search Functions


Click on Search Reviews under **Search** on the Navigation bar. This will open the **Search iTrack Reviews page** that contains a table of iTrack Reviews. You may search all Reviews several ways from this page.

1. Enter a term in the search bar at the top and click Go.

Note: This will limit the search for the term to the displayed columns.

This search may be further narrowed by repeating this step with a second term; the results will be fields that contain **both** terms that were entered in the search bar.

Broaden or narrow this search by clicking on Actions and then click on Select Columns. Select the columns (i.e., fields) you want to include or exclude from the search.

	<h2 style="text-align: center;">Quality Section Procedures</h2>	
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Filter a search by clicking on Actions and then Filter. This will allow you to specify the columns and expressions to filter.

- Another way to search this page is to click on a column header and filter the contents of the column according to your search.
- A way to limit a search of Reviews, Items, or Responsible Parties to an **Organization** is to first select the Division/Section at the top of the page, and then continue with your search.

Clear search filters by clicking on the x to the right of the selected filter. (This will appear under the search bar).

Steps to use other search functions (Items, Responsible Organizations, Causal Analysis, Responsible Parties, Corrective Action Plans and Milestones) are the same as described for "Search Reviews."

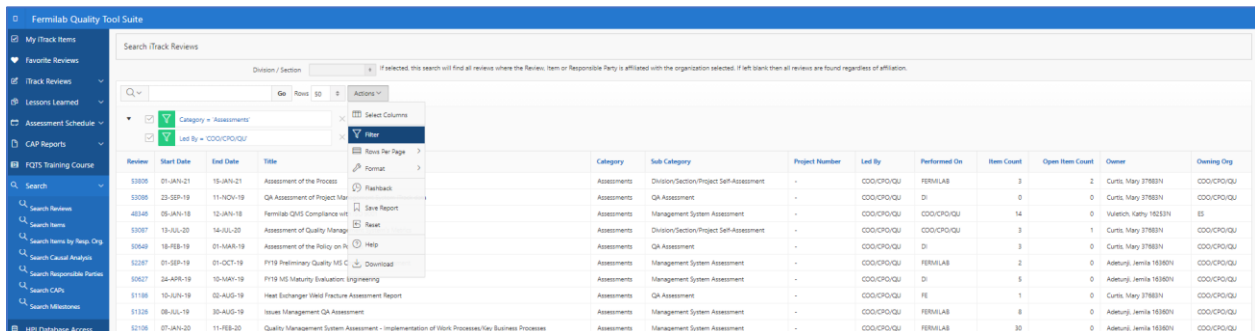
8.2 Saving Searches

The filters selected for searches may be saved for future use by performing the following steps.

- Select the filters for the search.
- Click the Actions button next to the Search bar and select "Save Report" (Figure 32a). A new window will open. (Figure 32b)
- In the new window, name and describe the search. Click Apply.

This search is now saved. To access it, click on the field to the right of the Search bar. A dropdown list of saved searches will appear. Select the one of interest. (Figure 32c)

Figure 32a Saving Search Filters Step 1



Review	Start Date	End Date	Title	Category	Sub-Category	Project Number	Lead By	Performed On	Item Count	Open Item Count	Owner	Owning Org
53005	01-JAN-21	15-JAN-21	Assessment of the Process	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	FERMILAB	3	2	Curtis, Mary 37883N	COO/CPO/QU
53008	22-SEP-19	11-NOV-19	QA Assessment of Project War	Assessments	QA Assessment	-	COO/CPO/QU	DI	0	0	Curtis, Mary 37883N	COO/CPO/QU
48240	05-JAN-18	12-JAN-18	Fermilab QMS Compliance	Assessments	Management System Assessment	-	COO/CPO/QU	COO/CPO/QU	14	0	Vaetich, Kathy 16233N	ES
53007	13-JUL-20	14-JUL-20	Assessment of Quality Manag	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	COO/CPO/QU	3	1	Curtis, Mary 37883N	COO/CPO/QU
30640	18-FEB-19	01-MAR-19	Assessment of the Policy on its	Assessments	QA Assessment	-	COO/CPO/QU	DI	3	0	Curtis, Mary 37883N	COO/CPO/QU
53267	01-SEP-19	01-OCT-19	F119 Preliminary Quality MS C	Assessments	Management System Assessment	-	COO/CPO/QU	FERMILAB	2	0	Adetunji, Jemila 16383N	COO/CPO/QU
30627	28-APR-19	10-MAY-19	F119 MS Maturity Evaluation Engineering	Assessments	Management System Assessment	-	COO/CPO/QU	DI	5	0	Adetunji, Jemila 16383N	COO/CPO/QU
51186	10-JUN-19	02-AUG-19	Heat Exchanger Weld Fracture Assessment Report	Assessments	QA Assessment	-	COO/CPO/QU	FE	1	0	Curtis, Mary 37883N	COO/CPO/QU
51126	08-JUL-19	30-AUG-19	Issues Management QA Assessment	Assessments	Management System Assessment	-	COO/CPO/QU	FERMILAB	8	0	Adetunji, Jemila 16383N	COO/CPO/QU
52106	07-JAN-20	11-FEB-20	Quality Management System Assessment - Implementation of Work Processes/Key Business Processes	Assessments	Management System Assessment	-	COO/CPO/QU	FERMILAB	30	0	Adetunji, Jemila 16383N	COO/CPO/QU




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Figure 32b Saving Search Filters, Step 2

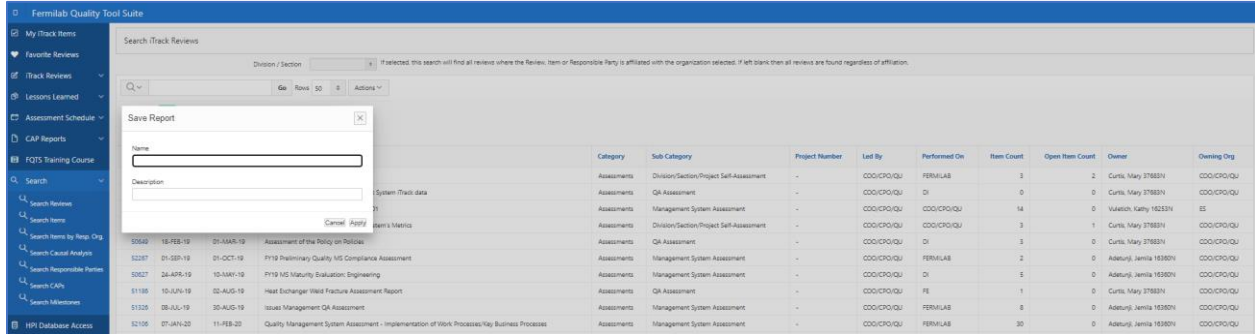
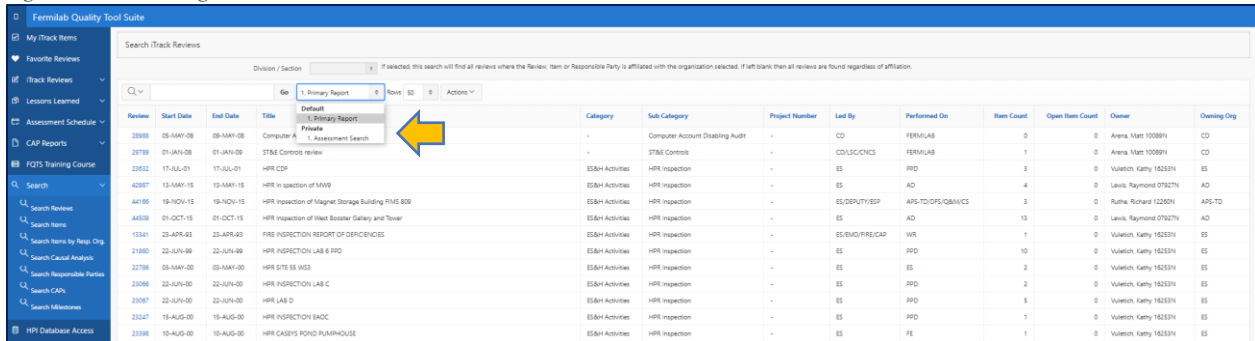


Figure 32c Accessing Saved Searches



8.3 Lessons Learned Database Search


To search the **Lessons Learned Database**, access the **Lessons Learned Reports** page by clicking on Lessons Learned on the left Navigation Bar.

1. Search by entering a term in the search bar at the top and click **Go**. This will search the information contained in all Lessons Learned Reports and other Reviews that contain a Lessons Learned item type.

Note: This will search for the term within only those columns displayed in the table.

This search may be further narrowed by repeating this step; the results will be fields that contain **both** terms that were entered in the search bar.

Broaden or narrow this search by clicking on **Actions** and then click on **Select Columns**. Select the columns (i.e., fields) you want to include or exclude from the search.

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Filter a search by clicking on Actions and then Filter. This will allow you to specify the columns and expressions searched.

- Another way to search this page is to click on each column header to filter the contents of the column.
- Clear search filters by clicking on the **x** to the right of the selected filter (under the search bar).

*Note: This page is the way to search for **keywords** in Lessons Learned. Again, keep in mind that the **keywords column** must be displayed in the table when the search is conducted.*

8.4 Export Data from Search Results

To export search results:

- Click on the **Actions** button at the top of the results page. (Figure 33a) Select “Download” from the list. A window will open. (Figure 33b)
- On the open window, select the format for the download. CSV will be an Excel file.

The search results will be exported and the data will not be connected to the live database and can be saved and manipulated.


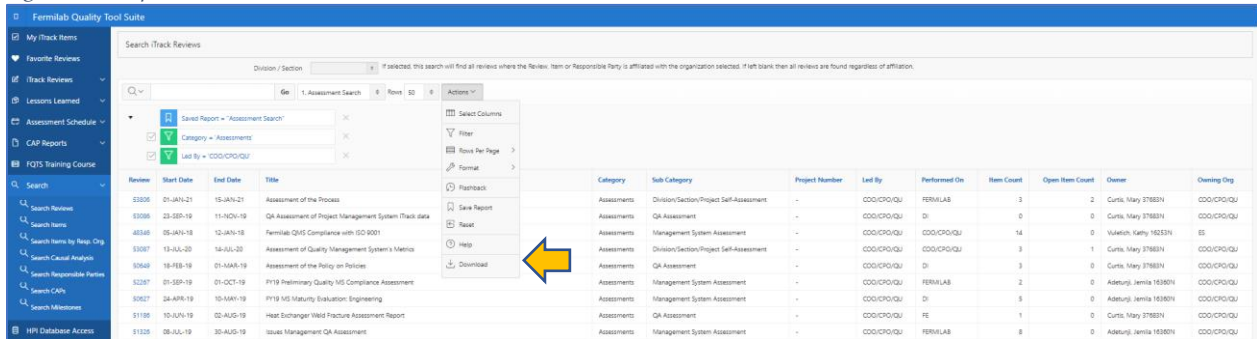
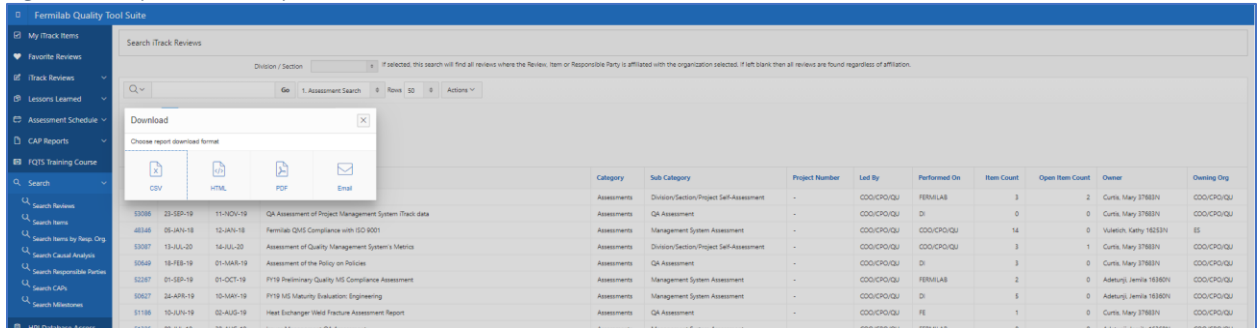
	<h1>Quality Section Procedures</h1>	
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Figure 33a Export Search Result



Review	Start Date	End Date	Title	Category	Sub Category	Project Number	Lead By	Performed On	Item Count	Open Item Count	Owner	Owning Org
53006	21-JAN-21	15-JAN-21	Assessment of the Process	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	FERMLAB	3	2	Curtis, Mary 37682N	COO/CPO/QU
48348	23-SEP-19	11-NOV-19	QA Assessment of Project Management System Track data	Assessments	QA Assessment	-	COO/CPO/QU	DI	0	0	Curtis, Mary 37682N	COO/CPO/QU
48348	05-JAN-18	12-JAN-18	Fermilab QMS Compliance with ISO 9001	Assessments	Management System Assessment	-	COO/CPO/QU	COO/CPO/QU	14	0	Vuleich, Kathy 16233N	ES
53007	13-JUL-20	14-JUL-20	Assessment of Quality Management System's Metrics	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	COO/CPO/QU	3	1	Curtis, Mary 37682N	COO/CPO/QU
53049	18-FEB-19	01-MAR-19	Assessment of the Policy on Policies	Assessments	QA Assessment	-	COO/CPO/QU	DI	3	0	Curtis, Mary 37682N	COO/CPO/QU
53267	01-SEP-19	01-OCT-19	P119 Preliminary Quality MS Compliance Assessment	Assessments	Management System Assessment	-	COO/CPO/QU	FERMLAB	2	0	Adetunji, Jemila 16380N	COO/CPO/QU
53627	24-APR-19	10-MAY-19	P119 MS Maturity Evaluation: Engineering	Assessments	Management System Assessment	-	COO/CPO/QU	DI	5	0	Adetunji, Jemila 16380N	COO/CPO/QU
51188	10-JUN-19	02-AUG-19	Heat Exchanger Weld Fracture Assessment Report	Assessments	QA Assessment	-	COO/CPO/QU	FE	1	0	Curtis, Mary 37682N	COO/CPO/QU
51320	08-JUL-19	30-AUG-19	Isotac Management QA Assessment	Assessments	Management System Assessment	-	COO/CPO/QU	FERMLAB	8	0	Adetunji, Jemila 16380N	COO/CPO/QU

Figure 33b Export Format Options



Review	Start Date	End Date	Title	Category	Sub Category	Project Number	Lead By	Performed On	Item Count	Open Item Count	Owner	Owning Org
53006	21-SEP-19	11-NOV-19	QA Assessment of Project Management System Track data	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	FERMLAB	3	2	Curtis, Mary 37682N	COO/CPO/QU
48348	05-JAN-18	12-JAN-18	Fermilab QMS Compliance with ISO 9001	Assessments	QA Assessment	-	COO/CPO/QU	DI	0	0	Curtis, Mary 37682N	COO/CPO/QU
53007	13-JUL-20	14-JUL-20	Assessment of Quality Management System's Metrics	Assessments	Management System Assessment	-	COO/CPO/QU	COO/CPO/QU	14	0	Vuleich, Kathy 16233N	ES
53049	18-FEB-19	01-MAR-19	Assessment of the Policy on Policies	Assessments	Division/Section/Project Self-Assessment	-	COO/CPO/QU	COO/CPO/QU	3	1	Curtis, Mary 37682N	COO/CPO/QU
53267	01-SEP-19	01-OCT-19	P119 Preliminary Quality MS Compliance Assessment	Assessments	QA Assessment	-	COO/CPO/QU	DI	3	0	Curtis, Mary 37682N	COO/CPO/QU
53627	24-APR-19	10-MAY-19	P119 MS Maturity Evaluation: Engineering	Assessments	Management System Assessment	-	COO/CPO/QU	FERMLAB	2	0	Adetunji, Jemila 16380N	COO/CPO/QU
51188	10-JUN-19	02-AUG-19	Heat Exchanger Weld Fracture Assessment Report	Assessments	Management System Assessment	-	COO/CPO/QU	DI	5	0	Adetunji, Jemila 16380N	COO/CPO/QU
51320	08-JUL-19	30-AUG-19	Isotac Management QA Assessment	Assessments	QA Assessment	-	COO/CPO/QU	FE	1	0	Curtis, Mary 37682N	COO/CPO/QU
51320	08-JUL-19	30-AUG-19	Isotac Management QA Assessment	Assessments	Management System Assessment	-	COO/CPO/QU	FERMLAB	8	0	Adetunji, Jemila 16380N	COO/CPO/QU

9.0 EFFECTIVENESS AND VERIFICATION REVIEWS

9.1 Effectiveness Review

After a nonconformance or management concern has been closed for 90 days, iTrack database sends an automated email alerting the Effectiveness Reviewer that the corrective action requires an **Effectiveness Review**. A link in the email will direct the Effectiveness Reviewer to the effectiveness review screen. (Figure 34) Find the Item that requires an effectiveness review and click the pencil next to the Item ID.


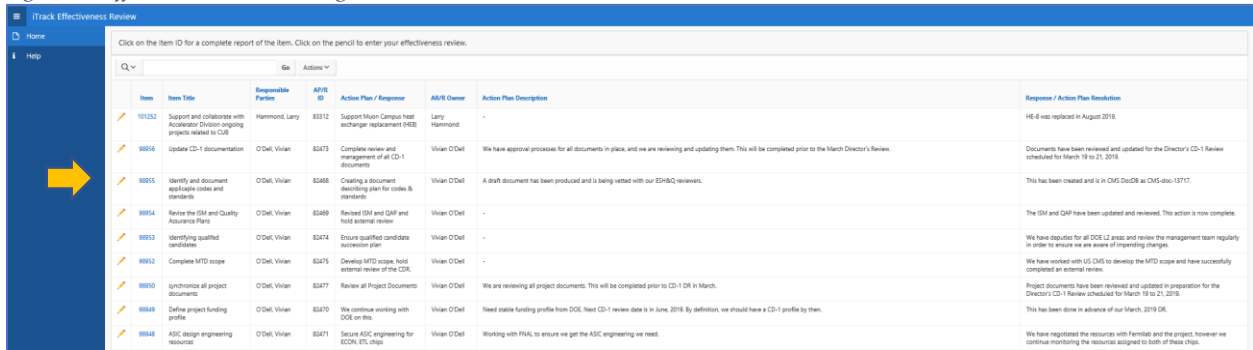
	<h1>Quality Section Procedures</h1>	
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Figure 34 Effectiveness Review Page



Item	Item Title	Responsible Parties	AP/R ID	Action Plan / Response	AP/R Owner	Action Plan Description	Response / Action Plan Resolution
101032	Support and collaborate with Accelerator Division ongoing projects related to CUB	Hammond, Larry	E8112	Support Muon Campus host exchange replacement CUB	Larry Hammond	-	HE-8 was replaced in August 2019.
98956	Update CD-1 documentation	O'Dell, Vivian	E8273	Complete review and management of all CD-1 documents	Vivian O'Dell	We have approval processes for all documents in place, and we are reviewing and updating them. This will be completed prior to the March Director's Review.	Documents have been reviewed and updated for the Director's CD-1 Review scheduled for March 19 to 21, 2019.
98955	Identify and document applicable codes and standards	O'Dell, Vivian	E8268	Creating a document describing plan for codes & standards	Vivian O'Dell	A draft document has been produced and is being vetted with our ESH&Q reviewers.	This has been created and is in CMS DocDB as CMS-doc-13717.
98954	Revise the QM and Quality Assurance Plans	O'Dell, Vivian	E8269	Revised QM and QAP and hold external review	Vivian O'Dell	-	The QM and QAP have been updated and reviewed. This action is now complete.
98953	Identifying qualified candidates	O'Dell, Vivian	E8274	Ensure qualified candidate succession plan	Vivian O'Dell	-	We have deputies for all DOE LL areas and review the management team regularly in order to ensure we are aware of impending changes.
98952	Complete MTD scope	O'Dell, Vivian	E8275	Develop MTD scope, hold external review of the CDB	Vivian O'Dell	-	We have worked with US CMS to develop the MTD scope and have successfully completed an external review.
98950	Synchronize all project documents	O'Dell, Vivian	E8277	Review all Project Documents	Vivian O'Dell	We are reviewing all project documents. This will be completed prior to CD-1 DR in March.	Project documents have been reviewed and updated in preparation for the Director's CD-1 Review scheduled for March 19 to 21, 2019.
98949	Define project funding profile	O'Dell, Vivian	E8270	We continue working with DOE on this	Vivian O'Dell	Need make funding profile from DOE. Next CD-1 review date is in June 2019. By definition, we should have a CD-1 profile by then.	This has been done in advance of our March 2019 DR.
98948	ASIC design engineering resources	O'Dell, Vivian	E8271	Secure ASIC engineering for ECDF, ITS chips	Vivian O'Dell	Working with FNLI to ensure we get the ASIC engineering we need.	We have negotiated the resources with Fermilab and the project, however we continue monitoring the resources assigned to both of these chips.

Action Plan Response screen (Figure 35a) will open.

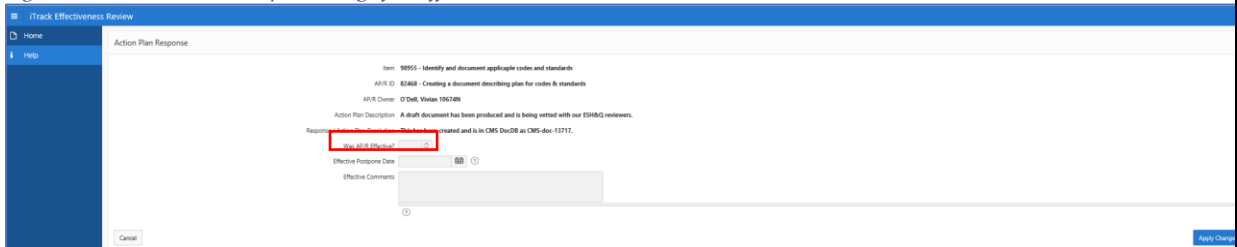
Steps to Complete Effectiveness Review in Action Plan Response Record (Figure 35a)

Item, AP/R ID, AP/R Owners, Action Plan Description, Response/Action Plan Resolution will be pre-populated. Complete the following.

1. **Was AP/R Effective** – Select Yes, No, or Defer
2. **Effective Postpone Date** – Complete only if “Defer” was selected in step 1.
3. **Effective Comments** – Required if AP/R not effective or deferring. Describe the reason for the decision.
4. Click **Apply Changes**

The iTrack Effectiveness Reviews page will open with the green “Action Process” confirmation box. *Note: If the effectiveness review result was the AP/R was not effective, the Item will automatically re-open. This will be noted in the green confirmation box (see Figure 35b).*

Figure 35a Action Plan Response Page for Effectiveness Review



Item: 98955 - Identify and document applicable codes and standards

AP/R ID: E8268 - Creating a document describing plan for codes & standards

AP/R Owner: O'Dell, Vivian 196786

Action Plan Description: A draft document has been produced and is being vetted with our ESH&Q reviewers.

Response: The document has been created and is in CMS DocDB as CMS-doc-13717.

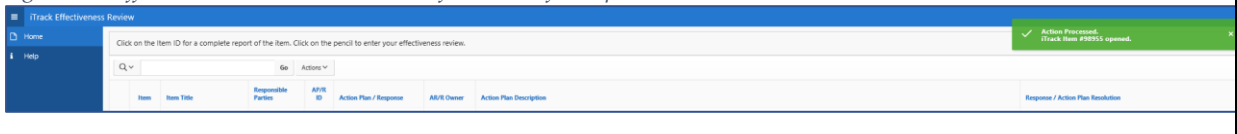
Was AP/R Effective: Effective

Effective Postpone Date:


Effective Comments:

Buttons: Cancel, Apply Changes

Figure 35b Effectiveness Review result – Confirmation of Re-opened Item



Item	Item Title	Responsible Parties	AP/R ID	Action Plan / Response	AP/R Owner	Action Plan Description	Response / Action Plan Resolution
101032	Support and collaborate with Accelerator Division ongoing projects related to CUB	Hammond, Larry	E8112	Support Muon Campus host exchange replacement CUB	Larry Hammond	-	HE-8 was replaced in August 2019.
98956	Update CD-1 documentation	O'Dell, Vivian	E8273	Complete review and management of all CD-1 documents	Vivian O'Dell	We have approval processes for all documents in place, and we are reviewing and updating them. This will be completed prior to the March Director's Review.	Documents have been reviewed and updated for the Director's CD-1 Review scheduled for March 19 to 21, 2019.
98955	Identify and document applicable codes and standards	O'Dell, Vivian	E8268	Creating a document describing plan for codes & standards	Vivian O'Dell	A draft document has been produced and is being vetted with our ESH&Q reviewers.	This has been created and is in CMS DocDB as CMS-doc-13717.
98954	Revise the QM and Quality Assurance Plans	O'Dell, Vivian	E8269	Revised QM and QAP and hold external review	Vivian O'Dell	-	The QM and QAP have been updated and reviewed. This action is now complete.
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98952	Complete MTD scope	O'Dell, Vivian	E8275	Develop MTD scope, hold external review of the CDB	Vivian O'Dell	-	We have worked with US CMS to develop the MTD scope and have successfully completed an external review.
98950	Synchronize all project documents	O'Dell, Vivian	E8277	Review all Project Documents	Vivian O'Dell	We are reviewing all project documents. This will be completed prior to CD-1 DR in March.	Project documents have been reviewed and updated in preparation for the Director's CD-1 Review scheduled for March 19 to 21, 2019.
98949	Define project funding profile	O'Dell, Vivian	E8270	We continue working with DOE on this	Vivian O'Dell	Need make funding profile from DOE. Next CD-1 review date is in June 2019. By definition, we should have a CD-1 profile by then.	This has been done in advance of our March 2019 DR.
98948	ASIC design engineering resources	O'Dell, Vivian	E8271	Secure ASIC engineering for ECDF, ITS chips	Vivian O'Dell	Working with FNLI to ensure we get the ASIC engineering we need.	We have negotiated the resources with Fermilab and the project, however we continue monitoring the resources assigned to both of these chips.

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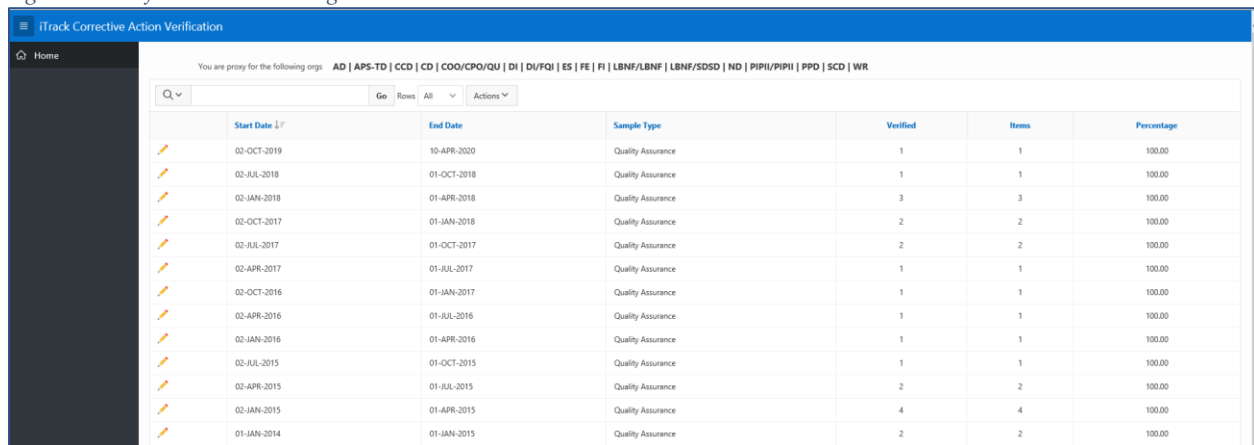


9.2 Verification Review

Once a quarter, iTrack generates mandatory verification reviews for closed nonconformances assigned a Risk Code of 1 or 2, and randomly selected samples of Risk Code 3. Corrective actions are verified as effective or ineffective. Quality Section or ES&H DSOs conduct the verification reviews. iTrack sends an email with a link to the verification review page (Figure 36) to the QS staff or DSO, notifying them of the required review.

Click on the pencil next to the Start Date to access the record.

Figure 36 Verification Review Page



	Start Date	End Date	Sample Type	Verified	Items	Percentage
	02-OCT-2019	10-APR-2020	Quality Assurance	1	1	100.00
	02-JUL-2018	01-OCT-2018	Quality Assurance	1	1	100.00
	02-JAN-2018	01-JAN-2018	Quality Assurance	3	3	100.00
	02-OCT-2017	01-JAN-2018	Quality Assurance	2	2	100.00
	02-JUL-2017	01-OCT-2017	Quality Assurance	2	2	100.00
	02-APR-2017	01-JUL-2017	Quality Assurance	1	1	100.00
	02-OCT-2016	01-JAN-2017	Quality Assurance	1	1	100.00
	02-APR-2016	01-JUL-2016	Quality Assurance	1	1	100.00
	02-JAN-2016	01-APR-2016	Quality Assurance	1	1	100.00
	02-JUL-2015	01-OCT-2015	Quality Assurance	1	1	100.00
	02-APR-2015	01-JUL-2015	Quality Assurance	2	2	100.00
	02-JAN-2015	01-APR-2015	Quality Assurance	4	4	100.00
	01-JAN-2014	01-JAN-2015	Quality Assurance	2	2	100.00

Figure 37 will open. Find the Responsible Organization and click on the pencil.

Figure 37 iTrack Samples – Organization

iTrack Corrective Action Verification

Home

iTrack Samples

Start Date

02-APR-15

End Date

01-JUL-15

Sample Type

Quality Assurance

Cancel

Q

Go

Actions

	Organization ↑	Risk Level	Items	Verified	Percentage
	ES	Low-Risk	1	1	100.00
	WR	Low-Risk	1	1	100.00

1 - 2

Figure 38 will open. Find the Item and click on the pencil next to the Item ID. Figure 39 will open.


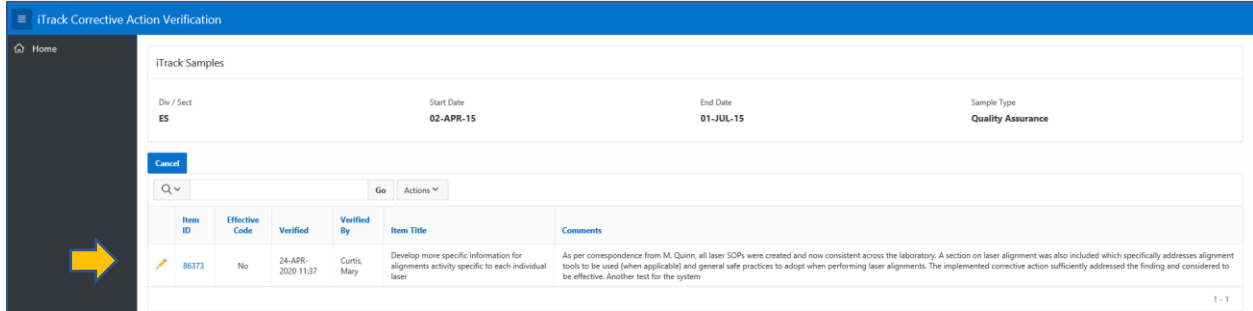
		Quality Section Procedures	
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Figure 38 iTrack Samples – Item



iTrack Corrective Action Verification

Home

iTrack Samples

Div / Sect: ES Start Date: 02-APR-15 End Date: 01-JUL-15 Sample Type: Quality Assurance

Cancel

Q Go Actions

Item ID	Effective Code	Verified	Verified By	Item Title	Comments
86373	No	24-APR-2020 11:37	Curtis, Mary	Develop more specific information for alignments activity specific to each individual laser	As per correspondence from M. Quinn, all laser SOPs were created and now consistent across the laboratory. A section on laser alignment was also included which specifically addresses alignment tools to be used (when applicable) and general safe practices to adopt when performing laser alignments. The implemented corrective action sufficiently addressed the finding and considered to be effective. Another test for the system

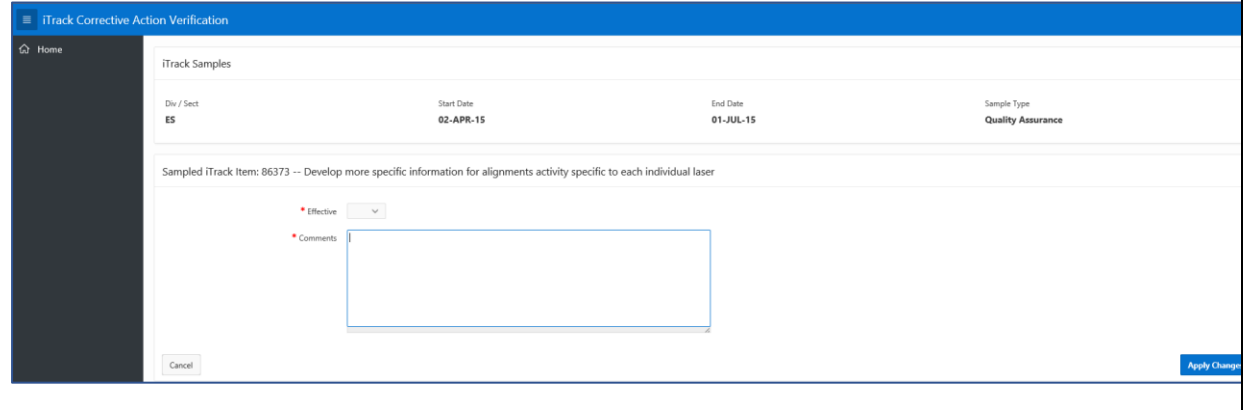
1 - 1

Steps to Complete Verification (Figure 39)

Finding, Title, Description, Risk and Corrective Action will pre-populate. Complete the remaining steps.

1. * **Effective**– Select Yes or No
2. * **Comments** – Record information about the implementation of the corrective action.
3. Click **Apply Changes**.

Figure 39 iTrack Samples page – Verification Review



iTrack Corrective Action Verification

Home

iTrack Samples


Div / Sect: ES Start Date: 02-APR-15 End Date: 01-JUL-15 Sample Type: Quality Assurance

Sampled iTrack Item: 86373 -- Develop more specific information for alignments activity specific to each individual laser

Effective:

Comments:

Cancel Apply Changes

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TECHNICAL APPENDIX

iTrack Terms

Causal Analysis ¹ – a way to uncover the underlying causes of a problem.

Review Category Groups with associated Categories ²

Assessments


1. **D/S/Project Self Assessment** – an assessment conducted entirely by D/S/P personnel and reported internally to the D/S/P leadership.
2. **Independent Assessment** – an assessment conducted by external or internal parties unrelated to the work or processes being evaluated.
3. **Management System Self-Assessment** – an assessment performed by a Management System Owner of their Management System against a procedure or requirement.
4. **QA Assessment** – an assessment conducted by the Quality Section against a specified procedure, requirement, or standard.
5. **SDSTA** – South Dakota Science and Technology Authority
6. **Triennial**
7. **Tripartite** – an assessment performed and planned jointly by a D/S, the ESH Section, and FSO and led by a member of the assessed organization.

ES&H Activities

1. **ES&H Drill**
2. **ES&H Walkthrough/Inspection** – an examination of a work area for the purposes of determining compliance to a specified requirement or standard.
3. **Management Walkthroughs** – a less formal assessment conducted by senior managers.
4. **Predictive Solutions** – ES&H database used to capture observations in the field for construction safety and facility safety.
5. **RCRA Inspections (Haz Waste Storage Fac)** – Resource Conservation and Recovery Act.

External Review

1. **DOE Review** – review planned and conducted by the Fermi Site Office (FSO).
2. **External Regulator**
3. **Financial Review**
4. **ISO** – International Standards Organization

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5. **Internal Audit** – an independent office that conducts audits and provides guidance regarding internal controls.
6. **National Science Foundation Review**
7. **Science and Technology**

Incidents or Events

1. **CAIRS** – Computerized Accident Incident Reporting System
2. **General Incident or Event Near Miss**
3. **NTS** – Noncompliance Tracking System
4. **ORPS** – Occurrence Report and Processing System
5. **ORPS/NTS**
6. **Suspect/Counterfeit Item⁴** – an item identified through visual inspection, testing, or other means that does not appear to conform to established Government or industry-accepted specifications or national consensus standards. A counterfeit item is one that has been copied or substituted without authority to do so or one that has been knowingly misrepresented.

Internal Laboratory Activities

1. **Accelerator Advisory Committee Review**
2. **Accelerator Readiness Review (ARR)**
3. **FRA/CAS Review**
4. **Operational Readiness Clearance (ORCs)**

PEMP Activities

1. **Notable Outcome**
2. **PEMP Feedback**


Project Activities

1. **DOE Project Review**
2. **Director's Review**
3. **EVMS Certification**
4. **Project Design/Readiness Review**
5. **Project Self-Assessment**
6. **Supplier Audit**

Items³

Best Practice – Method or technique that has consistently shown results superior to those achieved with other means, and that may be used as a benchmark.

Requirements:

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- Best Practices entered into iTrack do not require a root cause to be identified
- Best Practices do not require any Corrective/Preventive Actions or Responses
- They are entered into iTrack to be shared for information only

Lessons Learned – A best practice that is captured and shared to promote repeat application, or an adverse work practice or experience that is captured and shared to prevent recurrence.

Management Concern – An issue that management has identified as a concern requiring actions mitigate risk associated with issue.

Requirements in iTrack:

- Perform Risk Analysis
- Identify root cause (through Causal Analysis or HPI)
- Corrective or Preventive Actions identified

Nonconformance – The nonfulfillment of a specified requirement.

Requirements in iTrack:

- Perform Risk Analysis
- Identify root cause (through Causal Analysis or HPI)
- Corrective or Preventive Actions identified

Opportunity for Improvement – Suggestions identified on how to improve the identified topic.

Requirements in iTrack:


- Response is required
- Risk Analysis is Optional
- Does not require a root cause to be identified

Recommendation – A suggestion or proposal from the Reviewer as to the best course of action to be taken on an identified topic. *This term is typically reserved for DOE or project reviews.*

Requirements in iTrack:

- Response is required
- Risk Analysis is Optional
- Does not require a root cause be identified

References

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1. QAM Chapter 12050 *Root Cause Analysis*
2. QAM Chapter 12030 *FQTS Procedures and Risk Assignment*
3. QAM Chapter 12080 *Fermilab Assessment Program*
4. QAM Chapter 12020 *Suspect/Counterfeit Item (S/CI) Program*
5. [IMPACT User Guides](#)